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GAUTAM BUDDHA UNIVERSITY

LIST OF PUBLICATIONS

Publications in 2018

1. V. Tripathi, Anjana Singh, M..Tashfeen Ashraf (2018). Avenanthramides of Oats: Medicinal importance and future perspectives. Pharmacognosy Reviews: DOI: 10.4103/phrev.phrev_34_17.
2. Yadav M and Rathore JS (2018) TAome analysis of type-II toxin-antitoxin system from *Xenorhabdus nematophila*. Computational Biol and Chem doi.org/10.1016/j.compbiolchem.2018.07.010
3. Chaudhary, B., Singh, N., and Pandey, D. K. (2018) Bioengineering of crop plants for improved tetrahydrofolate production. Bioengineered doi.org/10.1080/21655979.2017
4. Garg G*, Ankita S, Bhati S, and Pandey S (2018). A plant aquaporin (SoPIP2; 1): Regulatory protein channel in plants under stress, Octa J. Biosci. Vol. 6(1)
5. Jitendra Kumar Verma, Vijay Wardhan, Deepali Singh, SubhraChakraborty, NiranjanaChakraborty. Genome-Wide Identification of Alba Gene Family in Plants and StressResponsive Expression of Rice Alba Genes. Genes (2018) ISSN 2073-4425
6. Hussain MS, Tripathi V., (2018) Smoking under hypoxic conditions: a potent environmental risk factor for inflammatory and autoimmune diseases. Mil Med Res. 2018 5(1):11. doi: 10.1186/s40779-018-0158-5.
7. Ali S, Singh V, Jain P, Tripathi V., (2018) Synthesis, antibacterial, anticancer and molecular docking studies of macrocyclic metal complexes of dihydrazide and diketone Journal of Saudi Chemical Society. <https://doi.org/10.1016/j.jscs.2018.04.005>
8. Singh A, Chauhan S. S, Tripathi V, (2018). Quinic Acid Attenuates Oral Cancer Cell Proliferation by Down-regulating Cyclin D1 Expression and AktSignaling. Pharma.Mgazine, (Accepted)
9. Kaushik AC, Kumar S, Wei DQ, Sahi S.(2018) Structure Based Virtual Screening Studies to Identify Novel Potential Compounds for GPR142 and Their Relative Dynamic Analysis for Study of Type 2 Diabetes. Front Chem. 6:23. doi: 10.3389/fchem.2018.00023. eCollection 2018.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

10. Pavan Kumar*, AnkitaAwasthi*, Vikrant Nain, Bijulssac, R. Puria, (2018) Novel insights into TOR signalling in *Saccharomyces cerevisiae* through Torin2. *Gene* 2018 669; 15-27.
11. AnkitaAwasthi, Vikrant Nain, R. Puria, (2018) MYOD and HAND transcription factors have conserved recognition sites in mTOR promoter: insights from in silico analysis. *Interdisciplinary Sciences: Computational Life Sciences* doi: 10.1007/s12539-018-0284-5.
12. AnkitaAwasthi, Vikrant Nain, Himanshi Singh, Pavan Kumar, R. Puria, (2018) Targeting Cancer cell metabolism via Target of Rapamycin. *Current Trends in Biotechnology and Pharmacy* 2018 Apr: 12(2); 196-205.
13. Nimisha Gaur, Ankit Sharma, B. Singhal (2018) "Bacterial Surface Layer Proteins: From Moonlighting to Biomimetics: A New Horizon to Lead", *Advances in Biosciences and Biotechnology* *Advances in Bioscience and Biotechnology*, 9, 352-372.
14. Aarti Singh, VishakhaVishwakarma, B. Singhal (2018) "Metabiotics: The Functional Metabolic Signatures of Probiotics: Current State-of-Art and Future Research Priorities", *Advances in Bioscience and Biotechnology*, 9, 147-189.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

Publications in 2017

1. SeemaDwivedi, MayankBajpai*, Dinesh Kumar Verma, NeelimaRathi (2017) Physio-chemical and bacteriological analysis/characterization of water nature of hindon river in gaziabad and noida. International Research Journal of Natural and Applied Sciences. 4(5):34-41. ISSN: 2349-4077, Impact Factor-5.46.
2. SeemaDwivedi, Dinesh Kumar Verma, MayankBajpai, NeelimaRathi (2017) Physico-chemical and bacteriological analysis of soil and water sample of industrial area – gajraoula. International Research Journal of Natural and Applied Sciences. 4(5):23-32. ISSN: 2349-4077, Impact Factor-5.46.
3. NeelimaRathi, Nagashree N Rao, SeemaDwivedi, (2017) Impact Of Elicitors In The Improvement Of Glycyrrhizin Production In The Cell Suspension Cultures Of Glycyrrhizaglabra L. Biochem. Cell. Arch. 17(1): 367-371.
4. NeelimaRathi, Nagashree N Rao, SeemaDwivedi et al (2017) Optimization Of Media Constituents For Regeneration Via Callus Cultures Of Glycyrrhizaglabra L. An Endangered Plant Biochem. Cell. Arch. 17(1): 389-398.
5. Kumar, S., Qamar, I., and Singh, N. (2017). Nonsteroidal Anti-inflammatory Drugs (NSAIDs). In: eLS. John Wiley & Sons, Ltd: Chichester. DOI: 10.1002/9780470015902.a0024221.
6. Chand V, Prakash J, Ashraf T, Gupta V. Can Vitamin D Slow Progression of Osteoarthritis? J Arthritis (2017); 6: 232. doi: 10.4172/2167-7921.1000232.
7. SrishtiJha, Mohd. Tashfeen Ashraf. Resource Utilization in Algal Cultures: Synergistic Effect of Biodiversity and Genetic Modification on Biomass Production. IJMB; 3(1) (2017) 1–8.
8. Abdul Arif Khan, Zakir Khan, Abdul Malik, MohdAbulKalam, Phillip Cash, Mohd. Tashfeen Ashraf, AwsAlshamsan (2017) Colorectal cancer-inflammatory bowel disease nexus and felony of Escherichia coli- Review Article. Life Sciences; Volume 180: 60-67.
9. Chaudhary, B. and Pandey, D. K. (2017) Bioengineering of Cotton for Increased Floral Inception and Fiber Initiation. India Patent Application No. 201711026325 A, 04 August 2017.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

10. Chaudhary, B. and Pandey, D. K. (2017) Method for enhanced tetrahydrofolate production by deregulation of allosteric inhibition of dihydroneopterin aldolase (DHNA). India Patent Application No.201711000033 A.
11. Navin Kumar, MohdShariq, Amarjeet Kumar, Rajesh Kumari, Naidu Subbarao, Rakesh K. Tyagi, GaurangaMukhopadhyay (2017). Analyzing the role of CagV, a VirB8 homologue of the type IV secretion system of *Helicobacter pylori*. FEBS Open Bio. DOI: 10.1002/2211-5463.12225.
12. Rajesh Kumari, MohdShariq, Navin Kumar, GaurangaMukhopadhyay (2017). Biochemical characterization of the *Helicobacter pylori* Cag-type IV secretion system unique component CagU. FEBS Lett. 591(3):500-512.
13. Sharma, Anamika; Nain, Vikrant; Tiwari, Rameshwar; Singh, Surender; Adak, Anurup; Nain, Pawan Kumar Singh; Nain, Lata; (2017) Simultaneous saccharification and fermentation of alkali-pretreated corncob under optimized conditions using cold-tolerant indigenous holocellulase Korean Journal of Chemical Engineering, 34:773-780.
14. rHuKGF ameliorates protease/anti-protease imbalance in emphysematous mice. Kotnala S, Tyagi A, Moyal JP. PulmPharmacolTher. 2017 Aug;45:124-135.
15. Recombinant Human Keratinocyte Growth Factor Attenuates Apoptosis in Elastase Induced Emphysematous Mice Lungs. SudhirKotnala, SumitBaghel, DeepaliVerma, AmitTyagi, Jai PrakashMoyal. In Press (2017). Inhalation Toxicology (Taylor & Francis).
16. Kaushik AC, Sahi S. (2017) Insights into unbound-bound states of GPR142 receptor in a membrane-aqueous system using molecular dynamics simulations. J BiomolStructDyn. Jun 22:1-18. doi: 10.1080/07391102.2017.1335234.
17. Kaushik, A.C. and Sahi, S., (2017) Modeling and Receptor based virtual screening studies of GPR139, International Journal of Bioinformatics Research and Applications, (Accepted).
18. Kaushik, A.C. and Sahi, S., (2017) Molecular modeling and molecular dynamics simulations based structural analysis of GPR3 Network Modeling Analysis in Health Informatics and Bioinformatics, DOI: 10.1007/s13721-017-0150-0 (Accepted)
19. Kaushik AC, Pal A, Kumar A, Dwivedi VD, Bharadwaj S, Pandey A, Mishra SK, Sahi, S. (2017) Internal transcribed spacer sequence database of plant fungal

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

pathogens: PFP-ITSS database. Informatics in Medicine Unlocked, 7, 34-38 doi 10.1016/j.imu.2017.02.006

20. Gautam LK, Yadav M, and Rathore JS. (2017) Functional annotation of novel toxin-antitoxin system Xn-RelT of *Xenorhabdus nematophila*; a combined in silico and in vitro approach. *J Mol Model* (2017) 23: 189.
21. Pandey DK, Kumar A, Rathore JS, Singh N, Chaudhary B (2017) Recombinant overexpression of dihydroneopterin aldolase catalyst potentially regulates folate-biofortification. *J Basic Microbiol.* 2017 Apr 18. doi: 10.1002/jobm.201600721.
22. Amit Kumar^{1,2}, Deepti Singh¹, Krishna K. Sharma^{1*}, Sakshi Arora¹, Amarjeet K. Singh³, Sarvajeet S. Gill⁴ and Barkha Singh¹, (2017), Gel-based purification and biochemical study of laccase isozymes from *Ganoderma* sp. and its role in enhanced cotton callogenesis, *Frontiers in Microbiology* 8, doi.org/10.3389/fmicb.2017.00674.
23. Singh, G., Fritz, S. M., Ranji, A., Singh, D., Boris-Lawrie, K. Isolation of Cognate RNA-protein Complexes from Cells Using Oligonucleotide-directed Elution. *J. Vis. Exp.* (119), e54391, doi:10.3791/54391 (2017).
24. Aggarwal C, Paul S, Tripathi Vishwas, Paul B, Khan MA. Characterization of putative virulence factors of *Serratia marcescens* strain SEN for pathogenesis in *Spodoptera litura*. *J Invertebrate Pathol.* 2017 Feb;143:115-123. doi: 10.1016/j.jip.2016.12.004.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

Publications in 2016

1. SeemaDwivedi , (2016) A comparative study of antibacterial activity & determination of phytochemical constituents of *Canthranthus roseus*, *Eclipta alba* and *Azadirachta indica* , Ethiopian International Journal of Multidisciplinary Research 2016; 3(3): 71 – 78
2. Swati Srivastava, SeemaDwivedi, (2016) Significance of RAAS pathway in HAP susceptibility , Journal of Clinical and Molecular Endocrinology , Vol.1.No.3: 24. ISSN 2572-5432
3. SeemaDwivedi , Adverse effects of oil spills on human and marine life and causing deterioration to ecological balance (2016), RESEARCH & REVIEWS: A JOURNAL OF TOXICOLOGY, (ISSN 2231-3834) ISSN: 2349-1264 , (Accepted)
4. SeemaDwivedi ‘assessment of physiochemical and monitoring of different parameters of the upper ganga canal water to preserve the biodiversity of the canal’ International Journal of Research in Science and Technology, (IJRST) 2016, Vol. No. 6, Issue No. II, 40-48. e-ISSN: 2249-0604; p-ISSN: 2454-180X, <http://www.ijrst.com> , Impact factor 1.922 .
5. SeemaDwivedi“ preparation and extraction of antibiotic from ovule of *cycas revoluta*” International Journal of Research in Science and Technology, (IJRST) 2016, Vol. No. 6, Issue No. II, 49-54. Apr-Jun, e-ISSN: 2249-0604; p-ISSN: 2454-180X, <http://www.ijrst.com> , Impact factor 1.922.
6. SeemaDwivedi‘microorganism– as biosensor for arsenic detection” International Journal of Research in Science and Technology, (IJRST) 2016, Vol. No. 6, Issue No. II, 55-67. Apr-Jun, e-ISSN: 2249-0604; p-ISSN: 2454-180X, <http://www.ijrst.com> , Impact factor 1.922.
7. SeemaDwivedi ‘The Role of Nanotechnology in Waste Water Treatment to Solve Water Crises in India" (2016) submitted for publication in the journal of "Omniscience: A Multi-disciplinary Journal (OSMJ)")” having ISSN (Online): 2231-0398, ISSN (Print): 2347-9949 with the Impact Factor: 3.592.
8. Kapil Sharma, Sanjeev Sharma and SeemaDwivedi “Comparative Study To Observe The Effect Of CML And Pure Alcohol On Soil Environment Of The Field Used For The Study Of Seed Germination And Growth Of (*Solanum melongena* L .var.sweekar321).” (2016) Journal of Chemical, Biological and physical sciences,

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

Vol.6, No.2; 336-343. E-ISSN: 2249-1929, ISI indexing and Impact Factor (2013-2014) 01.082.

9. SeemaDwivedi, Gyanendra Singh, Mohd. Nawaz Khan (2016). "Future Prospects & Economical Impacts of Algae Derived Biofuel" is accepted for publication in the Journal of "OmniScience: A Multidisciplinary Journal (OSMJ)" having ISSN (Online): 2231-0398, ISSN (Print): 2347-9949 with the Impact Factor: 3.592.
10. Satendra Singh, AtulKumar Singh, GulshanWadhwa, DevBukhsh Singh*, SeemaDwivedi, BudhyashGautam, Pramod W. Ramteke, (2016). A Quantitative Measure of Conformational Changes in Apo, Holo and Ligand – Complex form of Enzymes. Interdisciplinary Sciences: Computational Life Sciences. [IF: 0.67] [Springer] DOI10.1007/s12539-014-0251-8. 8(2): 192-201.
11. Satendra Singh, DevBukhsh Singh, Anamika Singh, BudhayashGautam, Gurudayal Ram, SeemaDwivedi, Pramod W. Ramteke (2016) An Approach for Identification of Novel Drug Targets in Streptococcus pyogenes SF370 Through Pathway Analysis. Interdisciplinary Sciences: Computational Life Sciences, December 2016, Volume 8, Issue 4, pp 388–394
12. Qamar I, Singh N., Waseem S., Prakash P., Nagoria VS, Ahmad MF (2016). 'Cloning and expression of novel LINGO-1 gene from Bubalus bubalis. World J Pharmacy & Pharmaceutical Sciences. 5 (6), 2013-2024.
13. Chaudhari, N and Qamar, I (2016). Polycystic ovary syndrome: conditions, genetics and current cure. EndocrinolMetabInt J 2016, 3(5): 00060.
14. Hegde, M., Mantelingua, K., Swarupa HA., Pavankumara CS., Qamar, I., Raghavan, SC., and Rangappaa SK. (2016). Novel PARP Inhibitors Sensitize Human Leukemic Cells in an Endogenous PARP Activity Dependent Manner. Royale Society of Chemistry, Advances, RSC Adv., 2016,6, 6308-6319.
15. Vishal Chand, Sipahelal Patel, Rachana Mishra, Baishnab C Tripathy, Jaya Prakash, Md. Tashfeen Ashraf and Varsha Gupta "Molecular signatures in peripheral blood mononuclear cells with osteoarthritis". Int. J. Clin. Rheum. (2016) Vol. 11, Issue 6.
16. Chaudhary, B. and Pandey, D. K. (2016) Methods of Producing Early Flowering and Enhanced Agronomic Traits in Plants. India Patent Application No. 201611036458 A, 28 October 2016.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

17. Poonam Mishra; Vijay Wardhan; SubhraChakraborty; GunjanGarg; NiranjanaChakraborty* (Communicated: BMC Plant Biology: Comparative analysis of sequence-structure-function relationship of the chickpea SUN-domain protein CaSUN1. PBIO-D-17-00116; [co-author]: [under publishing- process]
18. Garg* & Kumari (2016): Functional analysis of plants srg-genes/transmembrane protein (RLKs) under stress condition J. Biosci. Agric. Res. 09(02): 827-836 DOI: 10.18801/jbar.090216.100
19. GunjanGarg*, Durvesh Kumar (2016): Role of CBF/DRFBs in ABA Signaling during Cold Stress in Plants Electronic Journal of Biology, 2016, Vol.S1: 13-17, ISSN 1860-3122 [Plant Biology]
20. Effects of intraperitoneal administration of ATRA on the testis of elastase induced emphysematous rats. Swati Uniyal, Nimisha Sharma, SudhirKotnala, AmitTyagi, Jai PrakashMuyal. Research & Reviews: Journal of Toxicology. Vol 6, No. 3 (2016)
21. Chaudhary M, Singh V, Anvikar AR, Sahi S. Screening and In Vitro Evaluation of Potential Plasmodium falciparum LeucylAminopeptidase Inhibitors. CurrComput Aided Drug Des. 2016;12(4):282-293.
22. Kaushik, A.C. and Sahi, S., (2016) Biological complexity: Ant colony meta-heuristic optimization algorithm for protein folding. Neural Computing and Applications, pp.1-7. DOI 10.1007/s00521-016-2252-5
23. Kaushik, AC & Sahi, S. (2016) HOGPred: Artificial neural network based model for orphan GPCRs.. Neural Computing and Applications. doi:10.1007/s00521-016-2502-6
24. Rathore JS and Yan Wang (2016) Protective role of Th17 cells in pulmonary infection. Vaccine 2016 Feb 12. pii: S0264-410X(16)00163-8. doi: 10.1016/j.vaccine.2016.02.021. [Epub ahead of print] Review. Vaccine PMID:26878294
25. Gautam LK, Yennamalli RM, Rathore JS (2016) Implication on the function of novel Xn-reIE toxin structure of Xenorhabdusnematophila using Homology modeling. Current Bioinformatics (Accepted)
26. Sharma P, Ghosh C, Rathore JS. Anthocyanin: Structure, Synthesis and its Beneficial Role in Health. Research & Reviews: Journal of Food Science and Technology. 2016; 5(1): 45–55p.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

27. Naraian, R.; Singh, M. P. ; Ram, S. Supplementation of basal substrate to boost up substrate strength and oyster mushroom yield: An overview of substrates and supplements, *Int.J.Curr.Microbiol.App.Sci* (2016); doi: <http://dx.doi.org/10.20546/ijcmas> (enclosed)
28. Naraian, R.; Kumari S.; Ram, S. *Pleurotus* as an exclusive Eco-friendly modular Bioutil. CAB international 2016. The hand book of microbial bio-resources (eds V.K. Gupta) page 140-158
29. BarkhaSinghal, ShubhamSrivastava, Ankita Mukherjee (2016). Role of probiotics in pancreatic cancer prevention: The prospects and challenges, *Advances in Biosciences and Biotechnology*, 7, 468-500.
30. BarkhaSinghal, AdityaPundhir, AbhishekMaurya (2016). In vitro evaluation of functional attributes of LABs for the development of turmeric based probiotic beverage. *American Journal of Research Communication*, 2016: 4(9) ISSN: 2325-4076.
31. Teotia Sachin, Singh Deepali, Tang X, Tang G. Essential RNA-Based Technologies and Their Applications in Plant Functional Genomics. *Trends Biotechnol.* (2016) pii: S0167-7799(15)00248-6. doi: 10.1016/j.tibtech.2015.12.001.
32. Deepali Singh, IoanaBoeras, Gatikrushna Singh and Kathleen Boris-Lawrie. Isolation of cell-associated and virion-associated HIV-1 RNPs. *HIV Protocols* (2016) *Methods Mol Biol.* 2016;1354:133-46. doi: 10.1007/978-1-4939-3046-3_9.
33. Mishra, S.K., Niranjana, S.K., Banerjee, B., Singh, R., Singh, R.V., Kumar, N. and Kataria, R.S., 2016. Genetic diversity at MHC-DRB3 locus suggests distinctness of the riverine-swamp buffalo populations in North-East region of India. *Indian Journal of Animal Research* No. ARCC/B-3294.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

Publications in 2015

1. GauravBhushan, Jaspalsingh,Sauravkumar, SeemaDwivedi , and Santoshkumar Sharma , Impact of Bagasse Ash amended soil on growth and yield of Pisumsativum Research Journal of Pharmaceutical, Biological and Chemical Sciences. ISSN- 0975-8585, 2015.
2. GauravBhushan , Santosh Kr. Sharma , SeemaDwivedi , Saurav Kumar & AP Singh Effect of different storage structures on aflatoxin elaboration in seeds of pennisetumAmericanum (linn) during storage , Ethiopian International Journal of Multidisciplinary Research , ISSN: 2349-5715 ISSN: 2349-5707 2015 ,
3. GauravBhushan, Santosh Kr. Sharma, SeemaDwivedi and Saurabh Kumar. Use of ArbuscularMycorrhizal Fungi ASA Biofungicides against Seed-Borne Fungi of Sorghum vulgare. Annals of Natural Sciences Vol. 1(1), 2015.
4. Dwivedi, S. Phytoremediation of Lead by Brassica juncea and Vetiverzizanioidus, International Journal of Plant Biotechnology, Vol.1: issue 2, 2015.
5. Dwivedi, S. Production & Extraction of Bioethanol from Agricultural Waste, International Journal of Industrial Biotechnology & Biomaterials, ISSN 2455-7323 Vol.1: issue 2, 2015.
6. Qamar, I., Ahmad, F., and Narayansami, N. (2015). A time-course study of long term over-expression of ARR19 in mice. Nature's Scientific Reports, Sci Rep. 2015 Aug 11;5:13014.
7. Singh, N., Bhardwaj, R., Qamar, I. (2015). Formation of Persister in Klebsiellapneumoniae: Recombinant Expression and Purification of hipA and hipB proteins from K. pneumoniae. International journal of applied and pure science and agriculture 11/2015; 1(11):1-7.
8. Chaudhary, N and Qamar, I (2015). Advancement of Poly-(ADP – Ribose) Polymerase (PARP) Inhibitors in Cancer Progression and Treatment. International Journal of Animal Biotechnology & Applications Vol. 1: Issue 1 page 19-30.
9. GulamRabbani, Ejaz Ahmad, MohsinVahid Khan, Mohd. TashfeenAshraf, Rajiv Bhat and RizwanHasan Khan2015. "Impact of structural stability of cold adapted *Candida antarctica* lipase B (CaLB): in relation to pH, chemical and thermal denaturation". RSC Adv.,5, 20115-20131.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

10. MohdShariq, Navin Kumar, Rajesh Kumari, Amarjeet Kumar, Naidu Subbarao, GaurangaMukhopadhyay (2015). Biochemical Analysis of CagE: A VirB4 Homologue of Helicobacter pylori Cag-T4SS. PLoS One. Nov 13;10(11).
11. Singh, Vivek Kumar; Nain, Vikrant; Sharma, Priyanka; Rao, KRS Sambasiva; Birah, Ananta; Gupta, GP; Kumar, PA; (2015)Enhanced Toxicity of Purified Bacillus thuringiensis Cry1Ac \hat{I} -endotoxin. Current Trends in Biotechnology & Pharmacy,9.
12. JP Moyal, D Kumar, S Kotnala, V Moyal, AK Tyagi. Arch Bronconeumol. 2015 Recombinant Human Keratinocyte Growth Factor Induces Akt Mediated Cell Survival Progression in Emphysematous Mice. Jul;51(7):328-37.
13. Kaushik, A.C. and Sahi, S., 2015. Boolean network model for GPR142 against Type 2 diabetes and relative dynamic change ratio analysis using systems and biological circuits approach. Syst Synth Biol. 2015 Jun;9(1-2):45-54. doi: 10.1007/s11693-015-9163-0. Epub 2015 Mar 14.
14. Matthew Stake*, Deepali Singh*, J Marcela Hernandez, Rebecca Kaddis, Leslie J Parent, Kathleen Boris-Lawrie. HIV-1 and two avian retroviral 5' untranslated regions bind orthologous human and chicken RNA binding proteins. Virology (2015), 486:307-20. doi: 10.1016/j.virol.2015.06.001 * equal contribution
15. Deepali Singh, Robert Haicour, DarasinhSihachakr, and ManchikatlaVenkatRajam. Expression of rice chitinase gene in transgenic eggplant confers resistance to fungal wilts. Indian Journal of Biotechnology (2015), 14(2) 233-240.
16. ChetanaAggarwal .Sangeeta Paul .VishwasTripathi .Bishwajeet Paul. Md. Aslam Khan. Chitinolytic activity in Serratiamarcescens (strain SEN) and potency against different larval instars of Spodopteralitura with effect of sublethal doses on insect development. Bio Control Volume 60, Issue 5, pp 631-640,2015
17. ChetanaAggarwal .Sangeeta Paul .VishwasTripathi .BishwajeetPaul . Md. Aslam Khan. Chitinase producing Serratiamarcescens for biocontrol of Spodopteralitura (Fab) and studies on its chitinolytic activities. Ann.Agric.res.New series vol.36 (2): 132-137 (2015)
18. Urvashi, Ram, S. Pant P., Nagar S. Application of cloud computing in microbiological studies (Vibrio spp.) of Yamuna Water using PCR techniques. International journal of Science Technology & Management (IJSTM); Presented

School of Biotechnology
GAUTAM BUDDHA UNIVERSITY

in National Conference on RTICCN-2015 at CGC-COE ,Landran , Mohali(Punjab) on 26-27th March 2015.

19. Garg G.*, Yadav S., Ruchi, Yadav G. (2015). Key Roles of Calreticulin and Calnexin Proteins in Plant Perception under Stress Conditions: A Review; *Advances in Life Sciences* 2015, 5(1): 18-26, DOI: 10.5923/j.als.20150501.03.
20. AK. Dwivedi, V. Gurjar, S. Kumar, N. Singh. (2015) Molecular basis for nonspecificity of nonsteroidal anti-inflammatory drugs (NSAIDs). *Drug Discovery Today*; 20(7):863-73.

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GAUTAM BUDDHA UNIVERSITY

Publications in 2014

1. DevBukhsh Singh, Manish Kumar Gupta, Rajesh Kumar Kesharwani, MamtaSagar, SeemaDwivedi, Krishna Misra (2014) Molecular Drug targets and therapies for Alzheimer's disease, Translational Neuroscience [I F : 0 . 7 1] 5(3):203- 217.
2. Satendra Singh, Atul Kumar Singh, GulshanWadhwa, DevBukhsh Singh*, SeemaDwivedi, BudhyashGautam, Pramod W. Ramteke, (2014). A Quantitative Measure of Conformational Changes in Apo, Holo and Ligand-Complex form of Enzymes. Interdisciplinary Sciences: Computational Life Sciences [IF: 0.67] [Springer] DOI10.1007/s12539-014-0251-8
3. DevBukhsh Singh, Manish Kumar Gupta, Rajesh Kumar Kesharwani, MamtaSagar, SeemaDwivedi, Krishna Misra (2014) Molecular Drug targets and therapies for Alzheimer's disease. Translational Neuroscience [IF:0.71] 5(3):203-217.
4. Satendra Singh, DevBukhsh Singh*, GulshanWadhwa, BudhayashGautam, Gurudayal Ram, SeemaDwivedi, Pramod W. Ramteke (2014) An Approach for identification of novel drug targets and paralogous enzymes in Streptococcus pyogenes SF370 through pathway analysis" Interdisciplinary Sciences: Computational Lifesciences ISSN: 1913- 2751 , OCLC : 314146842.
5. Role of TCA cell cycle truncation in cancer cell energetics. Vikrant Nain, RichaBuddham, RekhaPuria and Shakti Sahi. Current trends in Biotechnology and Pharmacy 8(4) 2014.
6. Garg, G. and Kataria S (2014). Water deficit at the anthesis stage induces early leaf senescence and affects dry matter accumulation and remobilization efficiency in black gram (P. mungo, L.), J. of Adv Botany and Zoology, Vol. 1(4)
7. Garg, G. (2014). Applications of nanoproteomics in biological systems: A review, Int. J. Gen. Eng. and Tech., Vol. 3(4), pp 29-40
8. Goswami, Girish K; Krishnamohan, Medichtrla; Nain, Vikrant; Aggarwal, Chetana; Ramesh, Bandarupalli; (2014) Cloning and heterologous expression of cellulose free thermostable xylanase from Bacillus brevis, SpringerPlus, 3:20

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GAUTAM BUDDHA UNIVERSITY

9. Singh, Vivek Kumar; Gothandapani, Sellamuthu; Phanindra, Venkata; Lakshmi, Mullapudi; Nain, Vikrant; Sreevathsa, Rohini; Rao, KRS; Kumar, PolumetlaAnanda; (2014) Vacuolar Targeting of CryIAc and its Effects on Expression and Stability in Tobacco. *Current Trends in Biotechnology & Pharmacy*, 8.
10. Rathore JS and GautamLK. (2014) Expression, purification and functional analysis of novel relE operon from *X. nematophila*. *The Scientific World Journal* Volume 2014 (2014), Article ID 428159
11. Deepali Singh, AnnickAmbroise, Robert Haicour, DarasinhSihachakr, ManchikatlaVenkatRajam. Increased resistance to fungal wilts in transgenic eggplant expressing alfalfa glucanase gene. *Physiology and Molecular Biology of Plants* (2014) 20(2):143- 50
12. Sahi S, Raj U, Chaudhary M, Nain V.(2014) Modelling of Human LeucylAminopeptidases For In silico Off Target Binding Analysis Of Potential Plasmodium falciparum LeucineAminopeptidase (PfA-M17) Specific Inhibitors. *Recent Pat EndocrMetab Immune Drug Discov.* 8(3):191-201
13. Sahi S, Rai S, Chaudhary M, Nain V. (2014) Modeling of human M1 aminopeptidases for in silico screening of potential Plasmodium falciparum alanine aminopeptidase (PfA-M1) specific inhibitors, *Bioinformation.* Aug 30;10(8):518-25. doi: 10.6026/97320630010518.
14. Tewatia P, Agrawal N, Gaur M, Sahi S. (2014) Insights into the conformational perturbations of novel agonists with β 3-adrenergic receptor using molecular dynamics simulations. *Biochimie.* 101:168-82. doi: 10.1016/j.biochi.2014.01.016. Epub 2014 Feb 6.
15. V Nain, R Buddham, R Puria, S Sahi (2014) Role of TCA cycle Truncation in Cancer Cell Energetics. *Current Trends in Biotechnology and Pharmacy* 8 (4), 428-438
16. JP Muyal, S Kotnala, H Bhardwaj, ATyagi (2014). Effect of recombinant human keratinocyte growth factor in inducing Ras–Raf–Erk pathway-mediated cell proliferation in emphysematous mice lung. *Inhalation toxicology* 26 (13), 761-771.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

17. Tripathi Vishwas, Kumar R, Dinda AK, Kaur J, Luthra K. CXCL12-CXCR7 Signaling Activates ERK and Akt Pathways in Human Choriocarcinoma Cells. *Cell Communication. Adhesion*. 2014, Jan 23 PMID: 24450273
18. Khurana N, Singh R, Singh A, Tripathi Vishwas. Piperine induces down regulation of BCL2 and upregulation of BAD in smokeless tobacco induced Human oral squamous cell carcinoma (SCC4). *Int. Journal of Bio-Tech. and Res. Vol. 4, Issue 2, Apr 2014, 7- 14*
19. K Tripathi, AGarg, P Singh, S Kotnala, JP Moyal (2014). A Comparative Study on Production of Wine from Different Vegetables. *Research & Reviews: Journal of Food Science & Technology* 3 (2), 1-5.
20. Savneet Kaur and K. Anita. Angiogenesis in liver regeneration and fibrosis: A double-edged sword. *Hep Int.*, 2014;7:959-968.
21. Dev Buksh Singh, manishkumargupta, rajeshkumarkesharwani, mamtasagar, seemadwivedi, Krishna misra (2014): drug target and therapies for alzheimer disease., *translational neurosciences*, IF 0.71, 5 (3):203-217
22. Satendra Singh, Dev Buksh Singh, Seema Dwivedi, promod W. Ramtek (2014). a qualitative measure of conformational changes in apo, holo and ligands complex form of enzymes. *Interdisciplinary science: computational life science*, IF: 0.67, DOI 110.1007/S12539-014-0251-8.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

Publications in 2013

1. Navin Kumar*, MohdShariq, Rajesh Kumari, Rakesh K. Tyagi, GaurangaMukhopadhyay* (2013). Type IV Secretion System: CagI Independent Bacterial Surface Localization of CagA. PLoS One, 8: 1-13.
2. Abhinit Kumar Singh, SudhirKotnala, AnkitMaurya, Amit Kumar, and Jai PrakashMuyal. Effect of Moist Aeration towards Augmentation of Ascorbic Acid in Solanumtuberosum: A Molecular Approach. Research and Review: Journal of Food Science and Technology. Vol 2, No 3 (2013)
3. Jai PrakashMuyal, VandanaMuyal, SudhirKotnala, Dhananjay Kumar, Harsh Bhardwaj. Therapeutic Potential of Growth Factors in Pulmonary Emphysematous Condition. Lung (Springer). 2013 Apr;191(2):147-63
4. Arora N, Sahi S, Singh N (2013) Structural Mapping of Inhibitor Binding Sites on P-glycoprotein: Mechanism of Inhibition of P- Glycoprotein by Herbal Isoflavones. International J. Biochem& Review 3 (4), 421-35.
5. Rathore JS. (2013) Expression, purification and functional characterization of atypical xenocin, its immunity protein and their domains from Xenorhabdusnematophila. International Journal of Bacteriology Volume 2013 (2013), Article ID 746862
6. Rathore JS. (2013) Function inferences from a molecular structural model of YoeBXn toxin from Xenorhabdusnematophila. American Journal of Bioinformatics Research. 3 (2)
7. Rathore JS*, Singh MP, and Gautam P. (2013) Insilico analysis of novel hipAB, ccdBA, and yoeB-yefM Toxin-Antitoxin homolog's from the Genome of Xenorhabdusnematophila. American Journal of Bioinformatics Research. 3 (2) (*Corresponding author)
8. Singh, J. (2013) Role of D535 and H538 in endogenous toxicity of xenocin from Xenorhabdusnematophila. FEMES Microbiology letters 338: p 147-154.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

9. Sameer Giri and Singh, J*(2013) New Face in the Row of Human therapeutics: Bacteriocins. *Journal of Microbiology Research*, 3 (2) p71-78 (*Corresponding author)
10. Ram, S., and Naraian, R. (2013) Real-time Quantitative Polymerase Chain Reaction: A potential Tool for papthogen detection. *Recent Advances in Microbiology*. Volume 2, (https://www.novapublishers.com/catalog/product_info.php?products_id=44458; Editors: S.P. Tiwari, Rajesh Sharma and Rajeeva Gaur (Department of Microbiology, VBS Purvanchal University, Jaunpur, India.
11. BarkhaSinghal and KamendraSwaroop (2013). Optimization of culture variables for the production of L- asparaginase from *Pectobacteriumcarotovorum*, *African Journal of Biotechnology*, 12(50), 6959-6967.
12. N. Arora, S. Sahi and N. Singh (2013). Structural mapping of ligand binding sites on P-glycoproteins: Mechanism of inhibition of P-glycoprotein by herbal isoflavones. *Int. J. Biochem. Res. And Reviews*, 3(4), 421-435. 21.
13. S. Kaushik, N. Singh, S. Yamini, A. Singh, M. Sinha, A. Arora, P. Kaur, S. Sharma, T. P. Singh (2013). The Mode of Inhibitor Binding to PeptidyltRNA Hydrolase: Binding Studies and Structure Determination of Unbound and Bound Peptidyl-tRNA Hydrolase from *Acinetobacterbaumannii*. *PLoS ONE* 07/2013; 8(7):e67547. DOI:10.1371/journal.pone.0067547.
14. Chaudhary, B. (2013). Plant Domestication and Resistance to Herbivory. *International Journal of Plant Genomics* doi.org/10.1155/2013/572784

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

Publications in 2012

1. Dwivedi, S. Mishra, A. and Saini, D. Removal of heavy metals in liquid media through fungi isolated from waste water. International Journal of Science and Research (IJSR). 1, 181-185 (2012). Available on line at www.ijsr.net ISSN : 2319-7064.
2. Dwivedi, S. and Saini, D. Herbicide tolerant crops and weed management. International Journal of Science and Research (IJSR).1, 134-138 (2012).
3. Dwivedi, S., Sharma, S., Sharma, K., Singh, K. and Arun. Study on flowering and other growth behavior of Brinjal (*Solanum melongena*) var.BR112 in admiration to effect of C.M.L (Country Made Liquor). Journal of Chemical, Biological and Physical Sciences. 2, 1319-1325 (2012) e- ISSN: 2249 –1929, Impact Factor/ICV0.72 IF/ 5.69 ICV.
4. Dwivedi, S. Bioremediation of Heavy Metal by Algae: Current and Future Perspective. Journal of Advanced Laboratory Research in Biology. 3, 195-199 (2012) ISSN:0976- 7614.
5. Shukla, A., Priyadarshi,S., and Qamar, I. (2012). Involvement of Calcium and Vitamin C in Type 2 Diabetes. IOSR Journal of Pharmacy, Vol. 2, Issue 1, Jan-Feb.2012, pp.009-020.
6. HER2+ breast cancer therapy: by CPP-ZFN mediated targeting of mTOR? RekhaPuria, Shakti Sahi, Vikrant Nain. Tech cancer research treatment Apr 11, 2012.
7. Sahi S, Tewatia P, Ghosal S. (2012) Leishmaniadonovanipteridinereductase 1: comparative protein modeling and protein-ligand interaction studies of the leishmanicidal constituents isolated from the fruits of *Piper longum*. J Mol Model. Dec;18(12):5065-73. doi: 10.1007/s00894-012-1508-y. Epub 2012 Jul 3.

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

8. Tewatia P, Malik BK, Sahi S. (2012) Identification of Novel β 3-Adrenoceptor agonists using Energetic analysis, structure based Pharmacophores and Virtual screening , Comb Chem High Throughput Screen Sep;15(8):623-40.
9. Sahi S, Tewatia P, Malik BK. (2012) Modeling and Simulation Studies of Human β 3 Adrenergic Receptor and its Interactions with Agonists, Current Computer-aided drug design Dec 1;8(4):283-95.
10. Singh J. (2012) Structural and Functional Interferences from a Molecular Structural Model of Xenocin Toxin from Xenorhabdusnematophila. American Journal of Bioinformatics Research. 2 (4):p55-60
11. Singh, J*, Chaudhary, R, K., Gautam, P. (2012) Insilico analysis of novel relB, relE and mazF toxin-antitoxin homolog's from the genome of Xenorhabdusnematophila. 2(3): p21-32. American Journal of Bioinformatics Research (*Corresponding author)
12. Singh, J*. and Ghosh C. (2012) Ribosomal Encoded Bacteriocins: Their functional insight and applications. Journal of Microbiology Research 2(2): p19-25 (*Corresponding author)
13. Naraian, R.; Ram, S.; Kaistha, S.D.; Srivastava, J. Occurrence of plasmid linked multiple drug resistance in bacterial isolates of tannery effluent. Cell. Mol. Biol. 2012, 58, 134-141.
14. S. Kaur, Barkha Singhal (2012). When nano meets stem: The impact of nanotechnology in stem cell biology, Journal of Bioscience and Bioengineering 113:1-4.
15. Chen WY, Singh D, Lai LB, Stiffler MA, Lai HD, Foster MP, Gopalan V. Fidelity of tRNA 5'-maturation: a possible basis for the functional dependence of archaeal and eukaryal RNase P on multiple protein cofactors. Nucleic Acids Res. (2012) May;40(10):4666-80.
16. Swati Uniyal & Vishwas Tripathi*, Current insights into preeclampsia and future strategies. Int Journal of Biological & Pharmaceutical Research. 2012; 3(3): 297-307 *(Equal authorship)
17. Love Kumar Gupta & Vishwas Tripathi*, Chemokine receptors in HIV infection". Int. Jr. Pharmcy and Pharmaceutical Sciences, Vol-4:(3) 69-72, 2012. *(Equal authorship).

School of Biotechnology

GAUTAM BUDDHA UNIVERSITY

18. Malhotra N, Karmakar D, Tripathi Vishwas, Luthra K, Kumar S. Correlation of angiogenic cytokines-leptin and IL-8 in stage, type and presentation of endometriosis. *Gynecol Endocrinol*. 2012; 28 (3):224-7.
19. Kumar R, Tripathi Vishwas, Ahmad M, Nath N, Mir RA, Chauhan SS, Luthra K. CXCR7 mediated G α independent activation of ERK and Akt promotes cell survival and chemotaxis in T cells. *Cell Immunol*. 2012; 272 (2):230-41.
20. A. Kumar, N. Singh, R. Yadav, R.P. Kumar, S. Sharma, A. Arora, T. P. Singh (2012). Crystal structure of peptidyl-tRNA hydrolase from mycobacterium smegmatis reveals novel features related to enzyme dynamics. *Int. J. Biochem. Mol. Biol.* 3(1):58-69.
21. Puria R, Sahi S, Nain V. (2012) HER2+ breast cancer therapy: by CPP-ZFN mediated targeting of mTOR?, *Technol Cancer Res Treat*. Apr;11(2):175-9.
22. S. Teotia (2012): Functions of the poly(ADPribose) polymerase superfamily in land plants; *Cellular and Molecular Life Sciences*, 69(2):175-89.
23. Savneet Kaur, Ketki V. Dongre, Dinesh M. Tripath, Vishal Garg, Sheetal Nath Rooge, Puja Sakhuja, Asok Mukopadhyay, Shiv K. Sarin. Increased numbers and functions of circulating endothelial progenitor cells enhance angiogenesis in chronic liver diseases through paracrine factors. *J. Hepatol.*, 2012;57:1193-8.
24. Pandey, D. K., Singh, A.K. and Chaudhary, B. (2012) Boron-mediated Plant Somatic Embryogenesis: A provocative model. *Journal of Botany* doi : 10.1155/2012/375829.
25. Chaudhary, B., Chattopadhyay, P., Verma, N. and Banerjee, N. (2012). Understanding the phylomorphological implications of pollinia from *Dendrobium* (Orchidaceae). *American Journal of Plant Sciences* 3: 816-828.
26. Chattopadhyay, P., Banerjee, N. and Chaudhary, B. (2012). Genetic characterization of selected medicinal *Dendrobium* (Orchidaceae) species using molecular markers. *Research Journal of Biology* 2:117-125.