List up to ten important publications and/or patents

(*****nominee as corresponding author in all ten papers):

1. Maroof, A., Zubair, S., Farazuddin, M., Ejaj, A., Arbab, K., Qamar, Z., Abida, M., **Owais, M*** (2013). Development, characterization and efficacy of niosomal diallyldisulphide in treatment of disseminated murine candidiasis. **Nanomedicine** (Elsevier) 9(2): 247-256. **(Impact factor 5.70)**

   Highlights: This is the first report describing the development of essential oil and phytochemical-based niosome formulation. Recently, we have developed curcumin, perillyl alcohol, eugenol, and clove oil-based liposome/microcell formulations as well. The noisome-based formulation addressed stability issues and enhanced the efficacy of allyl sulfides against the treatment of candidiasis and other fungal infections. The DAS nanoparticles have great anticancer potential as well.

2. Saba Tufail, **Owais M***, Shadab Kazmi, Renu Balyan, Jasneet Kaur Khalsa, Syed Mohd. Faisal, Mohd. Asif Sherwani, Manzoor Ahmad Gatoo, Mohd Saad Umar and Swaleha Zubair (2014), Amyloid form of Ovalbumin evokes native antigen specific immune response in the host: prospective immuno-prophylactic potential. The Journal of Biological Chemistry. (**Impact Factor: 4.65**)

   High lights: In the present study, amyloids assembled from the model protein ovalbumin (OVA) were found to release the precursor protein in a slow and steady manner over an extended time period. The study suggests that amyloids may act as depots for the native form of the protein and therefore can be exploited as vaccine candidates, where slow antigen release over extended time periods is a pre-requisite for development of desired immune response.

3. Tan, D., Zia, Q., Zubair, S., Stapleton, P., Singh, R., **Owais, M***., Somavarapu, S. (2017) B Novel biodegradable poly (gamma-glutamic acid)-amphotericin B complexes show promise as improved amphotericin B formulations. **Nanomedicine**: Nanotechnology, Biology, and Medicine (Elsevier) pii: S1549-9634(17)30021-7. doi: 10.1016/j.nano.2017.02.003. **(Impact Factor: 6.70)**

   Highlights: The present study explores the usage of γ–PGA-based nano-particles as carriers of gold standard antifungal agent Amphotericin B. The novel PGA-based formulation was found to be extremely efficacious and showed better efficacy as compared to liposome-based commercially available AmpB nanoformulations in the treatment of fungal infections in model animals.

4. Deeba, F.; Tahseen, H. Nasti; Ahmad, N.; Sharad, S. K.; Akhtar, S.; Saleemuddin, M., **Owais, M**. (2005) Phospholipid diversity: correlation with membrane–membrane fusion events. Biochim Biophys. Acta (Biomembrane) 1669: 170-181. **[Impact Factor: 4.31]**

   The transport of various metabolically important substances along the endocytic and secretory pathways involves budding as well as fusion of vesicles with various intracellular compartments and plasma membranes. The membrane–membrane fusion events between various sub-compartments

of the cell are believed to be mainly mediated by so-called fusion proteins. This study shows that besides the proteins, lipid components of the membrane may play an equally important role in fusion and budding processes. Inside-out (ISO) as well as right-side-out (RSO) erythrocyte vesicles were evaluated for their fusogenic potential using conventional membrane fusion assay methods. Both fluorescence dequenching, as well as content mixing assays, revealed the fusogenic potential of the erythrocyte vesicles. Among the two types of vesicles, ISO was found to be more fusogenic as compared to the RSO vesicles. Interestingly, ISO retained nearly half of their fusogenic properties after the removal of the proteins, suggesting the remarkable role of lipids in the fusion process. In another set of experiments, fusogenic properties of the liposomes (subtilosome), prepared from phospholipids isolated from Bacillus subtilis (a lower microbe) were compared with those of erythrocyte vesicles. We have also demonstrated that various types of vesicles upon interaction with macrophages deliver encapsulated materials to the cytosol of the cells. Membrane–membrane fusion was also followed by the study, in which a protein synthesis inhibitor ricin A (that does not cross plasma membrane), when encapsulated in the erythrocyte vesicles or subtilosomes was demonstrated to gain access to the cytosol.

5. Ejaj Ahmad, Munazza T Fatima, M Saleemuddin, M., **Owais, M***. (2012) Plasma beads loaded with Candida albicans cytosolic proteins impart protection against the fungal infection in BALB/c mice **Vaccine** 30(48): 6851-6858. [**Impact factor 3.80**]

   Highlights: We have recently reported a procedure for the preparation of plasma beads (PB) from autologous plasma, necessitating no addition of foreign enzymes/proteins, with remarkable potential for sustained drug/antigens delivery. In this paper, we describe the use of plasma beads for the delivery of *C. albicans* cytosolic proteins (Cp) for effective immunization of BALB/c mice. We propose that immunization with plasma beads, in view of induction of both humoral and cell-mediated immunity, may be highly effective in combating virulence of the C. albicans. Considering the remarkable biocompatibility, biodegradability simple procedure required for the preparation from autologous plasma, the plasma bead may emerge as a useful vaccine delivery system.

6. Khan, A., Aijaz, A. K., Varun, D., Ahmad, M. G, Hakim, S., **Owais, M*** (2007) Tuftsin augments anti tumor efficacy of liposomised etoposide against fibrosarcoma in swiss albino mice. Molecular Medicine 13 (5-6): 266-276. [**Impact Factor: 6.02**]

   Highlights: In our earlier efforts we used tuftsin, a tetrapeptide with strong immune-potentiating properties, for the treatment of a range of infectious diseases. This is the first report highlighting the potential of tuftsin-bearing liposomes in the treatment of experimental fibrosarcoma.

7. Sharma, S. K., Deba, F., Bhattacharya, S., Bajpai, P., Agarwal, A., **Owais, M***. (2006) Escheriosome entrapped soluble blood stage antigens impart protective immunity against a multi-drug resistant isolate of Plasmodium yoeliinigeriensis in BALB/c mice. Vaccine 24(7): 948-956. [**Impact Factor: 3.60**]

   Highlights: In the present study we exploited the fusogenic potential of lower microbe's plasma membrane lipids in the development of novel liposomes. The liposomes were shown to deliver their contents into cytosol of target cells and successfully activate both humoral as well as cell-mediated immune responses in the host. The subunit vaccine was shown to obliterate a multi-drug resistant isolate of Plasmodium yoelii nigeriensis in BALB/c mice.

8. Atif SM, Salam N, Ahmad N, Hasan IM, Jamal HS, Sudhanshu A, Azevedo V, **Owais, M*** (2009) Sperm membrane lipid liposomes can evoke memory immune response against encapsulated antigen in Balb/c mice. **Vaccine** 26(46): 5874-5882). [**Impact Factor: 3.60**].

   Highlights: The sperm-ova fusion seems to be nature's strategy of targeted gene delivery. We isolated lipids from the sperm plasma membrane and developed a sub-unit vaccine against experimental murine candidiasis.

9. **Owais M**, Faisal SM, Ahmad N, Rauf MA, Umar MS, Mujeeb AA, Pachauri P, Ahmed A, Kashif M, Ajmal M, Zubair S. (2019) Bio-mediated synthesis of 5-FU based nanoparticles employing orange fruit juice: a novel drug delivery system to treat skin fibrosarcoma in model animals. **Scientific Reports** 9 (1): 12288. doi: 10.1038/s41598-019-48180-7. [**Impact Factor: 3.60**].

   Highlights: The present trend of biomimetic synthesis has been mainly directed toward metal-based nano-particles. We are the first to extend this approach to the synthesis of organic molecules-based nanoparticles. Earlier we developed Amphotericin-based NPs using Aloe vera leaf extract and established their microbicidal potential against Leishmania spp on one hand and various fungal isolates on the other. There was a tremendous improvement in the efficacy of as-formed 5-FU NPs against skin fibrosarcoma. The formulation can be used against other types of cancer as well.

10. Chauhan, A., Swaleha Z., Ahmad N., Sajid AA, Ansari, MY, **Owais, M***. (2014) Escheriosome mediated cytosolic delivery of Plk1 specific siRNA: Potential in treatment of liver cancer in Balb/c mice. **Nanomedicine** (Future Medicine, London) 9(4): 407-420. **[Impact factor 5.40]**

    Highlights: Despite the considerable potential of RNAi in the treatment of cancer and various other disorders, several impediments demand appropriate attention before exogenous siRNA can be widely used as an effective therapeutic agent. The data of the present study clearly set up a foundation for the usage of EC-based formulations of siRNA against the treatment of liver cancer in model animals. With an in-depth understanding of the biological compatibility and behavior of

new biomaterials in the tumor microenvironment, we will be able to design and develop more effective and sophisticated approaches for diagnostics and therapeutics.

12. A 50-word citation highlighting the work of the scientist which justifies the claim to the Fellowship ***(****This will be in addition to 200 word write-up required for Book of Nomination)*:

Prof. Owais has been working on development of novel systems for delivery of drugs and antigens to combat important diseases. He developed nano-particle based carriers for delivery of chemotherapeutic agents including siRNA for elimination of drug resistant pathogens and cancers. He has also developed nano-particle based DNA and subunit vaccines for specific targeting to dendritic cells. Further he demonstrated that pre-exposure of PBMCs with HIV-1 makes the cells resistant to subsequent challenge with HIV-2.

a) Research papers published in full: *(Average impact factor~3.78)*

Total Research articles: 200

Total Review articles: 20, Chapters in books: 16

a. Original research papers published in full:

1. Fatima T, Jolly R, Mushahid F, Khan N, Umar MS, **Owais M**, Shakir M (2023). Combinatorial approach to fabricate silica doped polyvinyl alcohol/hydroxyapatite/carrageenan nanocomposite for bone regeneration applications. **Polymers for Advanced Technologies**: 34(7). DOI:10.1002/pat.6048 (Impact Factor: 3.40)
2. Jamal F, Ahmed G, Farazuddin M, Altaf I, Farheen S, Zia Q, Azhar A, Ahmad H, Khan AA, Somavarapu S, Agrawal A., **Owais M**. (2023) Potential of siRNA-Bearing Subtilosomes in the Treatment of Diethylnitrosamine-Induced Hepatocellular Carcinoma. **Molecules**: 28(5):2191 (Impact Factor: 4.60)
3. Jamal F, Altaf I, Ahmed G, Asad S, Ahmad H, Zia Q, Azhar A, Farheen S, Shafi T, Karim S, Zubair S, **Owais M** (2023) Amphotericin B Nano-Assemblies Circumvent Intrinsic Toxicity and Ensure Superior Protection in Experimental Visceral Leishmaniasis with Feeble Toxic Manifestation. **Vaccines**: 11(1):100 (Impact Factor 5.6)
4. Asim Azhar, Mohammad A Wali, Qudsia Rashid, Wajihul Hasan Khan, Khaled Al-Hosaini, Owais, M., Mohammad Amjad Kamal (2023) Crosstalk between SARS-CoV-2 Infection and Neurological Disorders: A Review **CNS & Neurological Disorders-Drug Targets**: 22(5), 643-658. (Impact Factor: 2.82)
5. Khan FB, Uddin S, Elderdery AY, Goh KW, Ming LC, Ardianto C, Palakot AR, Anwar I, Khan M, **Owais M**, (2022) Illuminating the Molecular Intricacies of Exosomes and ncRNAs in cardiovascular diseases: Prospective Therapeutic and Biomarker Potential. ***Cells***: 11(22):3664. https://doi.org/10.3390/cells11223664 (Impact Factor: 6.6)

6. Farheen Badrealam Khan, Parul Singh, Yahya F Jamous, Syed Azmal Ali, Abdullah, Shahab Uddin, Qamar Zia, Manoj Kumar Jena, Mohsina Khan, Mohammad Owais, Chih Yang Huang, Venkatesh Chanukuppa, Chrismawan Ardianto, Long Chiau Ming, Waqas Alam, Haroon Khan, Mohammad Akli Ayoub (2022) Multifaceted pharmacological potentials of curcumin, genistein, and tanshinone IIA through proteomic approaches: an in-depth review Cells: 15 (1) 249 (Impact Factor: 6.6)
7. Qamar H, **Owais M**, Hussain T. Nano-microbial based technology employing polyvalent phage conjugate: A next-generation weapon for antimicrobial resistance lurking behind wastewater. **Environ Res**. 215(Pt 1):114079. doi: 10.1016/j.envres.2022.114079. Epub 2022 Aug 27. PMID: 36030912 (Impact Factor: 8.49).
8. Ansari A, Ali A, Khan N, Saad Umar M, **Owais M**, (2022) Synthesis of steroidal dihydro pyrazole derivatives using green ZnO NPs and evaluation of their anticancer and antioxidant activity. **Steroids** 188:109113. doi: 10.1016/j.steroids.2022.109113. Epub 2022 Sep 21. PMID: 36152868 (Impact Factor: 2.76).
9. Faraz Ahmad, Mohd. Saad Umar, Swaleha Zubair, Nazoora Khan, Pushpa Gupta, Umesh Datta Gupta, **Mohammad Owais**. Efficacy of IL10/STAT3 directed small molecule immunotherapy in augmenting the potential of rBCG30 vaccine against murine pulmonary tuberculosis, **Molecular Immunology**, Volume 150, 2022, Page 14, https://doi.org/10.1016/j.molimm.2022.05.053 (Impact Factor: 4.17).
10. Khan N, Umar MS, Haq M, Rauf T, Zubair S, **Owais M**. Exosome-encapsulated ncRNAs: Emerging yin and yang of tumor hallmarks. **Frontiers in Genetics** 2022 Oct 20;13:1022734. doi: 10.3389/fgene.2022.1022734. PMID: 36338993; PMCID: PMC9632295 (Impact Factor: 4.37).
11. Alshameri AW, **Owais M** (2022) Antibacterial and cytotoxic potency of the plant-mediated synthesis of metallic nanoparticles Ag NPs and ZnO NPs. Open Nano: 8, 100077 (Impact Factor: 9.50)
12. Ansam Wadia Alshameri, **Mohammad Owais**, Ishrat Altaf, Saba Farheen (2022) Rumex nervosus mediated green synthesis of silver nanoparticles and evaluation of its in vitro antibacterial and cytotoxic activity. **Open Nano**: 8, 100084 (Impact Factor: 9.50).

13. AMA Ali, MEAM El-Nour, AA Al-Atar, **Owais M.**, MAR El-Sheikh. Chemical panti-5-lipoxygenasexygenase and cyclooxygenase inhibitory effects of ginger (Zingiber officinale) rhizome, callus, and callus treated with elicitors. **Ciencia Rural** 52.
14. Hina Qamar, DK Chauhan, Mohd Owais (2021) Protective efficacy of novel nanoparticle based vaccine against new castle disease Biochemical & Cellular Archives 21(2).
15. Zia, Q., MT Rehman, M Hashmi, S Siddiqui, AAA Bin Dukhyil, MZ Ahmed, **O Mohammad**. Effect of date palm (Phoenix dactylifera) phytochemicals on Aβ1-40 amyloid formation: An in-silico analysis, **Frontiers in neuroscience**, 1124 (Impact Factor 5.15).
16. Asim Azhar, WH Khan, PA Khan, K Al-Hosaini, **M Owais**, A Ahmad (2022) Mucormycosis and COVID-19 pandemic: Clinical and diagnostic approach. **Journal of Infection and Public Health:** 15 (4), 466-479 (Impact Factor: 3.32).
17. S. Mirza, R Jolly, I Zia, MS Umar, **M Owais**, M Shakir. (2022) Fabrication of Biobased Nanocomposites by Chemical Intervention of Nano-Hydroxyapatite in Aloe Vera Gel-Guava Seed Matrix for Bone Tissue Engineering. **ChemistrySelect**: 7(6): e202103051 (Impact Factor: 2.3).
18. Farheen S, Oanz AM, Khan N, Umar MS, Jamal F, Altaf I, Kashif M, Alshameri AW, Somavarapu S, Wani I, Khan S, **Owais M**. (2022). Fabrication of microbicidal silver nanoparticles: green synthesis and implications in the containment of bacterial biofilm on orthodontal appliances. **Frontiers in Nanotechnology**: 7:19. (Impact Factor: 4.92)
19. Faraz Ahmad, Mohd. Saad Umar, Nazoora Khan, Fauzia Jamal, Pushpa Gupta, Swaleha Zubair, Umesh Datta Gupta and **Mohammad Owais** (2021) Immunotherapy With 5, 15-DPP Mediates Macrophage M1 Polarization and Modulates Subsequent *Mycobacterium tuberculosis* Infectivity in rBCG30 Immunized Mice. **Frontiers in Immunology**, section Vaccines and Molecular Therapeutics Manuscript ID: 12:706727. https://doi.org/10.3389/fimmu.2021.706727, [IF 8.70]

20. S Farheen, S Agrawal, S Zubair, A Agrawal, F Jamal, I Altaf, A Kashif Anwar, SM Umair, **M Owais** (2021) Patho-Physiology of Aging and Immune-Senescence: Possible Correlates With Comorbidity and Mortality in Middle-Aged and Old COVID-19 Patients. **Frontiers in Aging** 2:748591. doi: 10.3389/fragi.2021.748591
21. Azhar A, Al-hosaini K, Khan PA, Oanz AM, Zia Q, Banawas S, Dong JJ, Kamal MA, **Owais M**. Promiscuous biological features of newly emerged SARS-CoV-2 facilitate its unrestrained outbreak: an update. **Coronaviruses**. 2021; 2:1-6.
22. Hina Qamar, Adil Saeed, **Mohammad Owais**, Touseef Hussain, Kashif Hussain, Sarfraz Ahmed, Sachin Kumar, Zulfiqar Ahmad Khan (2021) CuO Bionanocomposite with Enhanced Stability and Antibacterial Activity against Extended-Spectrum Beta-Lactamase Strains. **Materials** 14 (21): 1331
23. M Shahnawaz Khan, Mohd Umar Hayat, Madiha Khanam, Haris Saeed, **Mohammad Owais**, Mohd Khalid, M Shahid, Musheer Ahmad (2021). Role of biologically important imidazole moiety on the antimicrobial and anticancer activity of Fe (III) and Mn (II) complexes. **Journal of Biomolecular Structure and Dynamics** 39 (11): 4037-4050
24. MS Ahmad, M Khalid, MS Khan, M Shahid, M Ahmad, H Saeed**, M Owais,** M.Ashafaq (2021). Tuning biological activity in dinuclear Cu (II) complexes derived from pyrazine ligands: Structure, magnetism, catecholase, antimicrobial, antibiofilm, and anti-breast cancer activity**. Applied Organometallic Chemistry** 35 (7), e6221. https://doi.org/10.1002/aoc.6221
25. Mohamed F AlAjmi, Asim Azhar**, Mohd Owais**, Summya Rashid, Sadaf Hasan, Afzal Hussain, Md Tabish Rehman. Antiviral potential of some novel structural analogs of standard drugs repurposed for the treatment of COVID-19. **Journal of Biomolecular Structure and Dynamics** 2020: 1-13.
26. Fauzia Jamal, Manish Kumar Singh, Jagadish Hansa, Pushp Anjali, Ghufran Ahmad, Saad UM, Manas R Dikhit, Anzar Abdul Mujeeb, Sanjiva Bimal, Pradeep Das, Shubhankar K Singh, Swaleha Zubair, **Owais, M** (2020) A Leishmania specific promiscuous membrane protein Tubulin Folding Cofactor D divulges Th1/Th2 polarization in the host via ERK-1/2 and p38 MAPK signaling cascade**. Frontiers in Immunology**, (section Vaccines and Molecular Therapeutics) Manuscript ID: 506961. [IF 8.7]

27. Khan MS, Hayat MU, Khanam M, Saeed H, **Owais M**, Khalid M, Shahid M, Ahmad M (2020) Role of biologically important imidazole moiety on the antimicrobial and anticancer activity of Fe (III) and Mn (II) complexes. **Journal of Biomolecular Structure and Dynamics**: 1-17. [IF 4.120]
28. Fatima N, Ahmed SH, Chauhan SS, **Owais M**, Rehman SM. Structural equation modelling analysis determining causal role among methyltransferases, methylation, and apoptosis during human pregnancy and abortion. **Scientific Reports**. 2020 Jul 24;10(1):1-5. [IF 4.120]
29. AlAjmi MF, Azhar A, **Owais M**, Rashid S, Hasan S, Hussain A, Rehman MT. Antiviral potential of some novel structural analogs of standard drugs repurposed for the treatment of COVID-19. **Journal of Biomolecular Structure and Dynamics**. 2020 Jul 29:1-3. [IF 4.10]
30. Zia I, Jolly R, Mirza S, Umar MS, **Owais M**, Shakir M. Hydroxyapatite Nanoparticles Fortified Xanthan Gum–Chitosan Based Polyelectrolyte Complex Scaffolds for Supporting the Osteo-Friendly Environment. **ACS Applied Bio Materials**. 2020 Sep 4;3(10):7133-46.
31. **Owais M**, Faisal SM, Ahmad N, Rauf MA, Umar MS, Mujeeb AA, Pachauri P, Ahmed A, Kashif M, Ajmal M, Zubair S. (2019) Bio-mediated synthesis of 5-FU based nanoparticles employing orange fruit juice: a novel drug delivery system to treat skin fibrosarcoma in model animals. **Scientific Reports (NPG)** 9(1):12288. doi: 10.1038/s41598-019-48180-7. [IF 4.40]
32. Umar MF, Ahmad F, Saeed H, Usmani SA, **Owais M**, Rafatullah M (2020) Bio- Mediated Synthesis of Reduced Graphene Oxide Nanoparticles from Chenopodium album: Their Antimicrobial and Anticancer Activities. **Nanomaterials,**10(6):1096. [IF 4.080]
33. Mirza, S., R Jolly, I Zia, Saad Umar, **Owais, M,** Shakir, M. (2020). Bioactive Gum Arabic/κ-Carrageenan-Incorporated Nano-Hydroxyapatite Nanocomposites and Their Relative Biological Functionalities in Bone Tissue Engineering. **ACS Omega** 5: (20) 11279–11290. [IF 3.40]
34. Saeed, H, Mateen, S, Moin, S, AQ Khan, **Owais, M**. (2020). Cardiac glycoside digoxin ameliorates pro-inflammatory cytokines in PBMCs of rheumatoid arthritis patients in vitro **International Immunopharmacology** 82: 106331 [IF 3.60]

35. Jolly, R., AA Khan, SS Ahmed, S Alam, S Kazmi, **Owais**, **M**, MA Farooqi, Mohd Ahmadullah Farooqi, Mohammad Shakir. (2020). Bioactive Phoenix dactylifera seeds incorporated chitosan/hydroxyapatite nanoconjugate for prospective bone tissue engineering applications: A bio-synergistic approach. **Materials Science and Engineering**: C 109, 110554 [IF 4.10]
36. AA Mujeeb, NA Khan, F Jamal, KFB Alam, H Saeed, S Kazmi, **Owais, M**. (2020). *Olax scandens* mediated biogenic synthesis of Ag-Cu nanocomposites: potential against inhibition of drug-resistant microbes**. Frontiers in Chemistry** 8 [IF 5.54]
37. Bano, N., MA Rauf, Owais, M, Shakir M. (2020) Pharmacologically bio-relevant N-functionalized homo-binuclear macrocyclic complexes: synthesis, spectral studies, biological screening, HSA binding, and molecular docking. **Inorganic and Nano-Metal Chemistry** 49 (12), 413-430
38. Qamar H, Owais M, Chauhan DK, Rehman S. Isolation of bacteriophages from untreated sewage water against multi-drug resistant E. coli-An initiative to fight against drug resistance. Research Square.
39. Ahmed, N., NK Konduru, Owais M (2019) Design, synthesis and antimicrobial activities of novel ferrocenyl and organic chalcone based sulfones and bis-sulfones. **Arabian Journal of Chemistry** 12 (8), 1879-1894
40. Mateen S, Saeed H, Moin S, Khan AQ, Owais, M (2019) T helper cell subpopulations repertoire in peripheral blood and its correlation with sex of newly diagnosed arthritis patients: A gender based study. International Immunopharmacol. 74:105675. (IF 3.60).
41. Kazmi S, Mujeeb AA, **Owais M**. (2018) Cyclic undecapeptide Cyclosporin A mediated inhibition of amyloid synthesis: Implications in alleviation of amyloid induced neurotoxicity. **Scientific Reports (NPG)** 23; 8(1):17283 (Impact Factor: 4.99).
42. Badrealam F. Khan, Hamidullah, Sonam Dwivedi, RiturajKonwar, Swaleha Zubair, **Owais, M** (2019) Potential of bacterial culture media in biofabrication of metal nanoparticles and the therapeutic potential of the as-synthesized nanoparticles in conjunction with artemisinin against MDA-MB-231 breast cancer cells. **Journal of Cellular Physiology:** 234(5): 6951-6964. (IF 3.92]
43. Mubin N, Pahari S, **Owais M**, Zubair S. (2018) Mycobacterium tuberculosis host cell interaction: Role of latency associated protein Acr-1 in differential modulation of macrophages. **PLoS One**: 2018 Nov 5;13(11): e0206459. **[IF 2.80]**

44. Mubin N, Umar, MS, Zubair, S., **Owais, M** (2018) Selective targeting of 4SO4-N-Acetyl-Galactosamine functionalized M. tb protein loaded chitosan nanoparticle to macrophages: correlation with activation of Immune System. **Frontiers in Microbiology:**9, 2469 **[IF 4.10]**
45. Ahmar RM, Swaleha Z, Hira A, Subodh P, Ajmal KM, **Owais M** (2018) Synergistic effect of Diallylsulphide with Zinc oxide Nanorods: A novel anthe d effective approach for treatment of acute dermatitis in model animals. **Frontiers in Microbiology:** 9:586. doi: 10.3389/fmicb.2018.00586 **[IF 4.1]**
46. Tufail S, Sherwani MA, Shoaib S, Azmi S, **Owais M**, Islam N.(2018) Ovalbumin self-assembles into amyloid nanosheets that elicit immune responses and facilitate sustained drug release. **J Biol Chem**: 293(29):11310-11324. doi: 10.1074/jbc.RA118.002550. [pub ahead of print] **[IF 4.1]**
47. Mirza S, Zia I, Jolly R, Kazmi S, Owais M, Shakir M. (2018) Synergistic combination of natural bioadhesivebael fruit gum and chitosan/nano-hydroxyapatite: A ternary bioactive nanohybrid for bone tissue engineering.**Int J Biol Macromol** 119: 215-224. **[IF 3.7]**
48. Shakir, M., Reshma J., Aijaz Ahmad Khan, ShariqueAlam, MohdShoeb Khan, Mohd. Ahmar Rauf, **Owais, M.,** Mohd. Ahmadullah Farooqui. (2018) Resol based Chitosan/nano-hydroxyapetite nanosensamble for effective bone tissue engineering. **Carbohydrate Polym**ers 179: 317-327. doi: 10.1016/j.carbpol.2017.09.103. Epub 2017 Oct 3] **[IF 4.8]**
49. Kaushik S, Iqbal N, Singh N, Sikarwar JS, Singh PK, Sharma P, Kaur P, Sharma S, **Owais M**, Singh TP (2018) Search of multiple hot spots on the surface of peptidyl-tRNA hydrolase: structural, binding and antibacterial studies. **Biochem J**. 475(3): 547-560. doi: 10.1042/BCJ20170666. **[IF 4.4]**
50. Ahmad F, Zubair, S, Gupta P, Gupta UD, Patel R, **Owais M**. (2017) Evaluation of Aggregated Ag85B Antigen for Its Biophysical Properties, Immunogenicity, and Vaccination Potential in a Murine Model of Tuberculosis Infection. **Front in Immunology** 8:1608. doi: 10.3389/fimmu.2017.01608. **[IF 6.70]**
51. Shoeb, M., Mobin, M., Rauf, A; **Owais, M.,**Naqvi, A. (2018) In vitro and in vivo antimicrobial evaluation of Graphene-Polyindole against Methicillin Resistant *Staphylococcus aureus* pathogen. ACS Omega 3 (8): 9431-9440.

52. Tauqir, A., Ahmar RM, **Owais, M.,** Abgeena, N. (2018) Green synthesis of silver nanoparticles, its characterization, and chaperone-like activity in the aggregation inhibition of α-Chymotrypsinogen A.. Int J Biol Macromol. pii: S0141-8130(18) 31307-2. doi: 10.1016/j.ijbiomac.2018.09.006. [Epub ahead of print] **[IF 3.7]**
53. Tauqir, A., Ahmar RM, Asim, R., **Owais, M,** Abgeena N. (2018) Thermal unfolding of human lysozyme induces aggregation: Recognition of the aggregates by antisera against the native protein. **International Journal of Biological Macromolecules,**113, 976-982**. [IF 3.7]**
54. Zia Q, Azhar A, Ahmad S, Afsar M, Hasan Z, **Owais M**, Alam M, Akbar S, Ganash M, Ashraf GM, Zubair S, Aliev G. (2017) PeMtb: A Database of MHC Antigenic Peptide of Mycobacterium tuberculosis. **Curr Pharm Biotechnol.** 10;18(8):648-652. **[IF 1.6]**
55. Fatima N, Faisal SM, Zubair S, Siddiqui SS, Moin S, **Owais M**. (2017) Emerging role of Interleukins IL-23/IL-17 axis and biochemical markers in the pathogenesis of Type 2 Diabetes: Association with age and gender in human subjects. **Int J Biol Macromol**. 105 (Pt 1): 1279-1288. doi: 10.1016/j.ijbiomac.2017.07.155. **[IF 3.7]**
56. Shakir M, Hanif S, Sherwani MA, **Owais M**, Azam M, Al-Resayes SI. (2016) Pharmacophore hybrid approach of new modulated bis-diimineCu(II)/Zn(II) complexes based on 5-chloro Isatin Schiff base derivatives: Synthesis, spectral studies and comparative biological assessment. **J Photochem. Photobiol B.** 157:39-56. doi: 10.1016/j.jphotobiol.2016.01.019. **[IF 3.2]**
57. Shakir, M., Nausheen, B., Mohd. Ahmar Rauf, **Owais, M.** Pharmacologically significant tetrazaa macrocyclic metal complexes derived from isatin and 3,4-diaminobenzophenone: Synthesis,spectralstudiesand comparative invitro biological assessment. **Journal of Chemical Sciences** 129 (12), 1905-1920. **[IF 1.2]**
58. Anam, A, Ali, A, Asif, M, Ahmar RM, **Owais, M** (2018) Facile one-pot multicomponent synthesis of steroidal oxazole/thiazole derivatives with effective antimicrobial, antibiofilm and hemolytic properties. **Steroids** 134, 22-36**. [I.F 2.8].**
59. Shakir, M., Nausheen, B., Ahmar RM, **Owais, M. (2018)** Pharmacological approach for bio-relevant N-functionalized homo-binuclear macrocyclic complexes based on 16 membered tetraaza units: Synthesis, spectral studies, biological screening, HSA binding and molecular docking..Journal of Inclusion Phenomena and MacrocyclicChemistry 59: 615-617.

60. Qamar Zia, Mohd. Ahmar Rauf, Wasi Ahmad, **Owais M.** Biomimetically engineered Amphotericin B nano-aggregates circumvent toxicity constraints against mammalian cells. **Scientific reports** 7 (1), 11873. **[IF 4.3]**

61. Tan, D., Zia, Q., Zubair, S., Stapleton, P., Singh, R., Owais, M., Somavarapu, S. (2017) B Novel biodegradable poly (gamma-glutamic acid)-amphotericin B complexes show promise as improved amphotericin B formulations. Nanomedicine: Nanotechnology, Biology, and Medicine (Elsevier) pii: S1549-9634(17)30021-7. doi: 10.1016/j.nano.2017.02.003. **(Impact Factor: 6.70)**
62. Ahmar, RM, **Owais, M.,** Ravikant, R., Faraz, A., Nazoora, K., Swaleha Z. (2017) Biomimetically synthesized ZnO nanoparticles attain potent antibacterial activity against less susceptible *S. aureus* skin infection in experimental animals. *RSC Adv.*, 7: 36361-36373. **[IF 3.2]**
63. Shakir, S. Mirza, R. Jolly, A. Rauf and **Owais, M** (2017) Synthesis, Characterization and in vitro screening of nano Hydroxyapatite/Chitosan/Euryale ferox Nano ensemble-An inimitable approach for Bone Tissue Engineering. M. New Journal of Chemistry, 42 (1), 363-371.**[IF 3.2]**
64. Shakir, M., Nausheen, B., Ahmar RM, **Owais, M. (2017)** Pharmacological approach for bio-relevant N-functionalized homo-binuclear macrocyclic complexes based on 16 membered tetraaza units: Synthesis, spectral studies, biological screening, HSA binding and molecular docking. Journal of Inclusion Phenomena and MacrocyclicChemistry 2341: 3342-3345.
65. Laskar, K., Mohd, SF.,Abdul, R., Anees, A., Owais, M. (2017) Undec-10-Laskar, K., Mohd, SF., Abdul, R., Anees, A., Owais, M. (2017) Undec-10-enoic acid functionalized chitosan based novel nano-conjugate: an enhanced anti-bacterial/biofilm and anti-cancer potential Carbohydrate Polymers.166: 14–23. **(Impact Factor: 4.10)**
66. Zia Q, Azhar A, Ahmad S, Afsar M, Hasan Z, Owais M, Alam M, Akbar S, Ganash M, Ashraf GM, Zubair S, Aliev G. (2017) PeMtb: a database of MHC antigenic peptide of Mycobacterium tuberculosis. Curr Pharm Biotechnol..doi: 10.2174/1389201018666170914150115. **(Impact Factor: 2.40)**

67. Zubair S, Azhar A, Khan N, Ahmad E, Ajmal M, Owais M. (2017) Nanoparticle-Based Mycosis Vaccine. Methods Mol Biol. 1625:169-211. doi: 10.1007/978-1-4939-7104-6_13. **(Impact Factor: 3.80)**
68. Owais M, Kaur J, Singh G, Faisal SM, Azhar A, Rauf MA, Gupta UD, Gupta P, Pal R, Zubair S. (2016) TLR Agonist Augments Prophylactic Potential of Acid Inducible Antigen Rv3203 against Mycobacterium tuberculosis H37Rv in Experimental Animals. PLoS One. 29;11(3):e0152240. **(Impact Factor: 3.45)**
69. Fatima N, Faisal SM, Zubair S, Ajmal M, Siddiqui SS, Moin S, Owais M. (2016) Role of Pro-Inflammatory Cytokines and Biochemical Markers in the Pathogenesis of Type 1 Diabetes: Correlation with Age and Glycemic Condition in Diabetic Human Subjects. PLoS One. 2016 Aug 30;11(8):e0161548. doi: 10.1371/journal.pone.0161548 (Impact Factor: 3.45).
70. Waseem Raza, Syed Mohammad Faisal, Mohammad Owais, D. Bahnemann, Muneer M. (2016) Facile fabrication of highly efficient modified ZnO photocatalyst with enhanced photocatalytic, antibacterial and anticancer activity **RSC Advances**, 6: 78335-78350. (Impact Factor: 3.88).
71. Zafar H, Kareem A, Sherwani A, **Owais M**, Ansari MA, Khan HM, Khan TA. (2015) Synthesis and characterization of Schiff base octaazamacrocyclic complexes and their biological studies. **J Photochem-Photobiol B.** 142:8-19. doi: 10.1016/j.jphotobiol.2014.10.004. Epub 2014 Oct 24.
72. Asif, MS, Tufail, S., Khan, AA, Owais, M. (2016) Dendrosome mediated topical gene silencing by PLK-1 specific siRNA: implication in treatment of skin cancer in mouse model. **RSC Advances** 6 (8), 6843-6857 **(Impact Factor: 3.84)**
73. Zaheer MR, Gupta A, Iqbal J, Zia Q, Ahmad A, Roohi, Owais M, Hashlamon A, MohdSetapar SH, Ashraf GM, AlievG.(2016) Molecular mechanisms of drug photodegradation and photosensitization.Curr Pharm Des.; 22(7):768-82. (Impact Factor: 2.84)
74. Azhar A, Ahmad E, Zia Q, Owais M, Ashraf GM. (2016) Recent updates on molecular genetic engineering approaches and applications of human therapeutic proteins. Curr. Protein Pept Sci. 2016. [Epub ahead of print]
75. Hassan MF, Rauf A, Sherwani A, Owais M. (2015) Synthesis and In Vitro Biological Evaluation of 1,3,4-Oxadiazol-2(3H)-one and Tetrahydropyridazine-3,6-dione Derivatives of Fatty Acids. Sci Pharm. 9;83 (3): 429-43.

76. Ahmad E, Zia Q, Fatima MT, Owais M., (2015) Vaccine potential of plasma bead-based dual antigen delivery system against experimental murine candidiasis. Int J Biol Macromol. 81:100-111. (Impact Factor: 9.08)
77. Ahmad E, Fatima MT, Hoque M, Owais M, Saleemuddin M. (2015) Fibrin matrices: The versatile therapeutic delivery systems. Int J Biol Macromol. 81:121-136. (Impact Factor: 9.08)
78. Sherwani MA, Tufail S, Khan AA, Owais M. (2015) Gold Nanoparticle-Photosensitizer Conjugate Based Photodynamic Inactivation of Biofilm Producing Cells: Potential for Treatment of C. albicans Infection in BALB/c Mice. PLoS One. 2015 Jul 6;10 (7): e0131684. doi: 10.1371/journal.pone.0131684. (Impact Factor: 3.45)
79. Tufail S, Badrealam KF, Sherwani A, Gupta UD, Owais M. (2013) Tissue specific heterogeneity in effector immune cell response. **Frontiers in Immunology** 4:254. doi: 10.3389/fimmu.2013.00254. **(Impact Factor: 8.40)**
80. Sherwani, M. A., Tufail, S., Khan A. A, Owais, M. (2015) Dendrimer-PLGA based multifunctional immuno-nanocomposite mediated synchronous and tumor selective delivery of siRNA and cisplatin: potential in treatment of hepatocellular carcinoma **RSC Advances** 5 (49): 39512-39531**(Impact Factor: 3.88)**
81. Ansari, MA, Qamar, Zia, Khan AA, Azhar, A, Owais, M. (2015), Efficacy of cell wall deficient spheroplasts against experimental murine listeriosis. **Scandinavian Journal of Immunology** 82(1):10-24. **(Impact Factor 2.15)**
82. Qamar, Z., Zubair, S., Khan, A. A., **Owais, M**. (2015) Self assembled amphotericin B loaded poly-glutamic acid nanoparticles: preparation, characterization and in vitro potential against Candida albicans. **International journal of Nano-medicine**. 10:1769-90. (Impact factor 4.21)
83. Shamsuzzaman, Mashrai, A., Khanam, H., Asif, M., Ali, A., Sherwani, A., Owais, M. (2015), Green synthesis and Biological Evaluation of Steroidal pyrans as Anticancer and Antioxidant agents, Journal of King Saud University-Science (Elsevier) 27: 1-6.
84. Shamsuzzaman, Khan AA, Abdul B, Abad A, Mohd A, Ashraf M, Hena K, Asif S, Zahid Y, Owais M. (2015) Synthesis, characterization, biological evaluation and molecular docking of steroidal spirothiazolidinones. Journal of Molecular Structure 1085: 104-114. (Impact Factor: 1.6)
85. Zafar, H, Kareem A, Sherwani, A, Owais, M, Ansari, MA, Khan HM (2015) Synthesis and characterization of Schiff base octaazamacrocyclic complexes and their biological

studies. Journal of Photochemistry and Photobiology B: Biology 142, 8-19. [Impact Factor: 2.9]

86. Abad Ali, Mohd Asif, Hena Khanam, Ashraf Mashrai, Mohd Asif Sherwani, **Owais, M**., Shamsuzzaman (2015) Synthesis and characterization of steroidal heterocyclic compounds, DNA condensation and molecular docking studies and their in vitro anticancer and acetylcholinesterase inhibition activities. RSC Advances: 5 (93): 75964-75984. (Impact Factor 3.88)
87. Khan A. A, Abdul Baqi, Abad Ali, Mohd Asif, Ashraf Mashrai, Hena Khanam, Asif Sherwani, Zahid Yaseen, Owais, M (2015) Synthesis, characterization, biological evaluation and molecular docking of steroidal spirothiazolidinones Journal of Molecular Structure 1085: 104-114. (Impact Factor 1.6)
88. Saud I. Al-Resayes, M. Shakir, M., Summaiya Hanif, Mohd. Asif Sherwani, Owais, M. (2015) Pharmacologically significant complexes of Mn (II), Co(II), Ni(II), Cu(II) and Zn(II) of novel Schiff base ligand, (E)-N-(furan-2-yl methylene) quinolin-8- amine: Synthesis, spectral, XRD, SEM, antimicrobial, antioxidant and in vitro cytotoxic studies.Journal of Molecular Structure. (Impact Factor 1.6)
89. Mohammad, F. Hassan, Abdul Rauf, Asif Sherwani, Owais, M (2015) Synthesis and In Vitro Biological Evaluation of 1,3,4-oxadiazole- 2(3H)-one and tetrahydropyridazine-3,6-dione Derivatives of Fatty acids. Sci Pharm; 9;83(3):429-43. doi:10.3797/scipharm.1503-10.
90. Asif, M., Ali, A., Mashrai, A., H Khanam, H., Sherwani, A., **Owais, M**. (2015) Design synthesis and biological evaluation of steroidal tetrazoles as antiproliferative and antioxidant agents. **European Chemical Bulletin** 3 (10-12): 1075-1080.
91. Saba Tufail, Owais, M., Shadab Kazmi, Renu Balyan, Jasneet Kaur Khalsa, Syed Mohd. Faisal, Mohd. Asif Sherwani, Manzoor Ahmad Gatoo, Mohd. Saad Umar and Zubair S (2015), Amyloid form of Ovalbumin evokes native antigen-specific immune response in the host: prospective immuno-prophylactic potential. The Journal of Biological Chemistry. (Impact Factor: 4.65)
92. Ahmad A, Varshney H, Rauf A, Sherwani A, Owais M (2014). Synthesis and anticancer activity of long chain substituted 1, 3, 4-oxadiazol-2-thione, 1, 2, 4-triazol-3-thione and 1, 2, 4-triazolo [3, 4-b]-1, 3, 4-thiadiazine derivatives. Arabian Journal of Chemistry doi:10.1016/j.arabjc.2014.01.015 (Impact Factor: 3.7)

93. Mashrai, A., Khanam, H., Asif, M., Ali, A, Sherwani, A, Owais, M (2014) Green synthesis and biological evaluation of steroidal 2 H-pyrans as anticancer and antioxidant agents. Journal of King Saud University-Science DOI: 10.1016/j.jksus.2013.10.001
94. Zafar, H, A Kareem, Sherwani, A, Owais M. (2014) Synthesis, characterization and biological studies of homo and hetero-binuclear 13-membered pentaaza bis (macrocyclic) complexes. Journal of Molecular Structure 1079, 337-346. (Impact Factor: 1.6)

95. Kareem, A., Zafar, H., Sherwani, A., Owais, M., Khan TA (2014) Synthesis, characterization and in vitro anticancer activity of 18-membered octaazamacrocyclic complexes of Co (II), Ni (II), Cd (II) and Sn (II). Journal of Molecular Structure 1075, 17-25 (Impact Factor: 1.6)
96. Ahmed N, Konduru NK, Ahmad S, Owais M. (2014) Design, synthesis and antiproliferative activity of functionalized flavone-triazole-tetrahydropyran conjugates against human cancer cell lines. Eur J Med Chem. 82:552-64. [Impact factor 3.60]
97. Farazuddin, M., Zia, Q., Sharma, B., Joshi, B., Owais, M. (2014) Chemotherapeutic potential of curcumin bearing microcells against hepatocellular carcinoma in model animals. International journal of Nano-medicine. 9:1139-1152. [Impact factor 4.21]
98. Ahmed N, Konduru NK, Ahmad S, Owais M. (2014) Synthesis of flavonoids based novel tetrahydropyran conjugates (Prins products) and their antiproliferative activity against human cancer cell lines. Eur J Med Chem. 75:233-46. [Impact factor 3.60]
99. Owais M, Kazmi S, Tufail S, Zubair S (2014) An alternative chemical redox method for the production of bispecific antibodies: implication in rapid detection of food borne pathogens. PLoS One. 17;9(3):e91255. [Impact factor 3.70]
100. Arun, C., Swaleha Z., Ahmad N., Sajid AA, Ansari, MY, Owais, M. (2014) Escheriosome mediated cytosolic delivery of Plk1 specific siRNA: Potential in treatment of liver cancer in Balb/c mice. **Nanomedicine** (Future Medicine, London) 9(4): 407-420. [Impact factor 5.81]

101. Varshney, H., Ahmad, A., Rauf, A., Sherwani, A., Owais, M. (2014) Multistep synthesis of 1-[{(5-alkenyl/hydroxy alkenyl substituted)-1,3,4-oxadiazol-2-yl}-methyl]-2-methyl-1H-benzimidazole series and in vitro anticancer screening, SAR studies. Medicinal Chemistry Research 33:4165-4170. [Impact factor 2.40]

102. Shamsuzzaman, Khanam H, Mashrai A, Sherwani A, Owais M, Siddiqui N. (2013) Synthesis and anti-tumor evaluation of B-ring substituted steroidal pyrazoline derivatives. Steroids 78:1263-1272 [Impact factor 2.84].

103. Khan AA, Jabeen M, Khan AA, Owais M. (2013) Anticancer efficacy of a novel propofol-linoleic acid-loaded escheriosomal formulation against murine hepatocellular carcinoma. Nanomedicine (Future Medicine, London). 8(8):1281-1294. [Impact factor 5.81].

104. Oves, M., Saghir MK, Almas Z, Arham SA, Faheem A, Ejaz A, Asif S, Owais, M., Ameer A. (2013) Antibacterial and cytotoxic efficacy of extracellular silver nanoparticles biofabricated from chromium reducing novel OS4 Strain of Stenotrophomonas maltophilia. **PLOS One** 8: (3) e59140. [Impact factor 3.60]

105. Maroof, A., Zubair, S., Farazuddin, M., Ejaj, A., Arbab, K., Qamar, Z., Abida, M., Owais, M. (2013), Development, characterization and efficacy of niosomaldiallyldisulphide in treatment of disseminated murine candidiasis. **Nanomedicine** (Elsevier) 9(2): 247-256. (Impact factor 6.70)

106. Kumar N. K., Sunita, D., Sajid, M., Owais, M., Ahmed, N. (2013) Synthesis and Antibacterial/ Antifungal Evaluation of Some Chalcone Based Sulfones and Bisulfones. European Journal of Medicinal Chemistry 59: 23-30. [Impact factor 3.60]

107. Ejaj Ahmad, Munazza T Fatima, M Saleemuddin, M., Owais, M. (2012) Plasma beads loaded with Candida albicans cytosolic proteins impart protection against the fungal infection in BALB/c mice.Vaccine 30(48): 6851-6858. [Impact factor 3.80]

108. Khan AA, Husain A, Jabeen M, Mustafa J, Owais M. (2012). Synthesis and Characterization of Novel n-9 Fatty Acid Conjugates possessing antineoplastic properties. Lipids 47(10):973-86. [Impact factor 2.40]

109. Khan AA, Jabeen M, Chauhan A, Owais M. (2012). Vaccine potential of cytosolic proteins loaded fibrin microspheres of *Cryptococcus neoformans* in BALB/c mice. **J Drug Target**. 20 (5): 453-66. **[Impact factor 2.70]**

110. Chauhan A, Zubair S, Sherwani A, Owais M (2012) Aloe vera induced biomimetic assemblage of nucleobase into nanosized particles. PLoS One 7(3): e32049. Epub 2012 **[Impact factor 4.40]**

111. Farazuddin M, Sharma B, Khan AA, Joshi B, Owais M. (2012) Anticancer efficacy of perillyl alcohol-bearing PLGA microparticles. **International J Nanomedicine**. 7: 35-47. **[Impact factor 4.21]**

112. Mairaj Ahmed Ansari, Swaleha Zubair, Saba Tufail, Ejaj Ahmad, Mohsin Raza Khan, Zainuddin Qadri, Owais, M. (2012) Ether lipid vesicle based antigens impart protection against experimental listeriosis. **International Journal of Nanomedicine** 7: 2433-2447. **[Impact Factor: 4.21]**

113. Sharma PK, Singh K, Singh R, Capalash N, Owais, M., Kaur J. (2012) Engineering of a metagenome derived lipase towards thermal tolerance: effect of aspargine to lysine mutation on the protein surface. **Gene** 491(2): 264-271. **[Impact Factor: 2.40]**

114. Khan, A. A., Alam, M., Tufail, S., Mustafa, J., Owais, M. (2011) Synthesis and characterization of novel PUFA esters exhibiting potential anticancer activities: An in vitro study. **Eur J Med Chem.** 46(10):4878-86. **[Impact factor 3.60]**

115. Chauhan, Arun, Zubair, Swaleha, Zia, Qamar, Tufail, Saba, Sherwani, Asif, Sajid, M., Owais, M. (2011). Biomimetic assemblage of nucleobase 5-fluorouracil into nano-size three-dimensional particles. Available from Nature Precedings<http://hdl.handle.net/10101/npre.2011.6182.1> (2011).

116. Ansari, M. A., Zubair, S., Mahmood, A., Gupta, P., Khan, A. A., Gupta, U. D., Arora, A., Owais, M. (2011) RD Antigen Based Nanovaccine Imparts Long Term Protection by Inducing Memory Response against Experimental Murine Tuberculosis. **PLoS One**. 6(8):e22889. Epub 2011 Aug 11.**[Impact Factor: 4.40]**

117. Arun, C., Swaleha, Z., Saba, T., Asif, S., Sajid, M., Suri C. R., Amir, A., Owais, M. (2011) Fungus-mediated biological synthesis of gold nanoparticles: potential in detection of liver cancer. **International Journal of Nanomedicine**. 6:2305-19. **[Impact Factor: 4.97]**

118. Fatima N, Ahmed SH, Salhan S, Rehman SM, Kaur J, Owais M, Chauhan SS. (2011) Study of methyl transferase (G9aMT) and methylated histone (H3K9) expressions in Unexplained Recurrent Spontaneous abortion (URSA) and normal early pregnancy. Mol Hum Reprod. 17(11):693-701. [Impact Factor: 3.10]

119. Gatoo, M. A., Siddiqui, M. U., Farhan, A. K., Kozgar, M. I., Owais, M. (2011), Oral cancer and gene polymorphisms: international status with special reference to India. Asian J Biochem 6: 113-121 [Impact Factor: 2.40]

120. Singha H, Mallick AI, Jana C, Fatima N, Owais M, Chaudhuri P. (2011) Co-immunization with interlukin-18 enhances the protective efficacy of liposomes encapsulated recombinant Cu-Zn superoxide dismutase protein against Brucella abortus. Vaccine 29(29-30):4720-4727. [Impact Factor: 3.60]

121. Chauhan A, Swaleha Z, Ahmad N, Farazuddin M, Vasco A, Abida M, Owais, M. (2011) Escheriosome mediated cytosolic delivery of Candida albicans cytosolic proteins induces enhanced cytotoxic T lymphocyte response and protective immunity. **Vaccine**. 29(33):5424-5433. **[Impact Factor: 3.60]**

122. Mahmood A, Srivastava S, Tripathi S, Ansari MA, Owais M, Arora A. (2011) Molecular characterization of secretory proteins Rv3619c and Rv3620c from Mycobacterium tuberculosis H37Rv. FEBS J. 278(2):341-253. [Impact Factor: 3.10]

123. Ahmad E., Fatima, TM, Owais, M., Saleemuddin, M (2011) Beaded plasma clot: a Potent sustained-release drug delivery system. Therapeutic Delivery (Future Science) 2(5): 573-583.

124. Farazuddin M, Chauhan A, Khan RM, Owais M. (2011) Amoxicillin-bearing microparticles: potential in the treatment of Listeria monocytogenes infection in Swiss albino mice. Bio-Science Reports 31(4):265-272. [Impact factor: 3.10]

125. Sharma PK, Singh K, Singh R, Capalash N, Ali A, Owais, M., Kaur J. (2011) Characterization of a thermostable lipase showing loss of secondary structure at ambient temperature. Mol. Biol Reports 2011 Jun 16. [Epub ahead of print].[Impact Factor: 1.8]

126. Ansari MA, Zubair S, Atif SM, Kashif M, Khan N, Rehan M, Anwar T, Iqbal A, Owais M. (2010) Identification and characterization of molten globule-like state of hen egg-white lysozyme in presence of salts under alkaline conditions. Protein Pept. Lett. 17(1):11-17.[Impact Factor: 1.80]

127. Dangi A, Dwivedi V, Vedi S, Owais M, Misra-Bhattacharya S. (2010) Improvement in the antifilarial efficacy of doxycycline and rifampicin by combination therapy and drug delivery approach. J Drug Target. 18(5):343-350.[Impact Factor: 2.70]

128. Alam, M., Farazuddin, M., Owais, M. (2009) Potential of liposomal diallylsulphide in treatment of experimental murine candidiasis. Bioscience Reports 30(4): 223-231 [Impact factor: 3.10].

129. Zaka-Ur-Rab S, Mahmood S, Shukla M, Zakir SM, Khan BA, Owais M. (2009) Systemic absorption of Triamcinolone Acetonide after posterior sub-tenon injection. Am J Ophthalmol. 148(3):414-419. [Impact factor: 2.40].

130. Dwivedi V, Vasco A, Vedi S, Dangi A, Arif K, Bhattacharya SM, Owais, M. (2009) Adjuvanticity and protective immunity of fusogenic liposome encapsulated *Plasmodium yoeliinigeriensis* blood stage soluble antigen. Vaccine (27(3):473-482. [Impact Factor: 3.80]

131. Atif SM, Salam N, Ahmad N, Hasan IM, Jamal HS, Sudhanshu A, Azevedo V, Owais, M. (2009) Sperm membrane lipid liposomes can evoke memory immune response against encapsulated antigen in Balb/c mice. Vaccine 26(46): 5874-5882). [Impact Factor: 3.60].

132. Varun, D., Dwivedi V, Khan A, Vasco A, Fatima N, Soni VK, Dangi A, Misra-Bhattacharya S, Owais, M. (2009) Immunomodulator effect of picroliv and its potential in treatment against resistant *Plasmodium yoelii* (MDR) infection in mice. Pharmaceutical Research 25:2312-2319. [Impact Factor: 4.50]

133. Singha, H., Mallick, A. I., Fatima, N., Jana, C., Isore, B. P., Goswami, T. K., Srivastava, S. K., Azevedo V. A., Chaudhary, P., Owais, M. (2008) Escheriosome entrapped DNA vaccine co-expressing Zn super oxide dismutase and IL-18 confers protection against Brucella abortus. Microbes & Infection 10(10-11): 1089-1096 [Impact Factor: 3.20]

134. Ahmad, I., Zahin, M., Aqil, F., S Hasan, S., MSA Khan, M. S. A., Owais, M. (2008), Bioactive compounds from Punicagranatum, Curcuma longa and Zingiber officinale and their therapeutic potential, Drugs of the Future 33(4): 329-346.

135. Mallick, A.I., Singha, H.S., Chaudhuri, P., Ahmad Ansari, M. Anwar, T., Owais, M. (2007) Potential of escheriosome mediated delivery of ribosomal recombinant L7/L12 protein against Brucella abortus 544 infection in BALB/c mice. Vaccine 46: 7873-7884. [Impact Factor: 3.80]

136. Sharma S. K., Gupta, C. M., Dwivedi, V. Bhattacharya, S., Owais, M. (2007) Prophylactic potential of liposomised integral membrane protein of *Plasmodium yoelii nigeriensis* against blood stage infection in Balb/C mice. Vaccine 25: 2103-2111. [Impact Factor: 3.80].

137. Khan, A., Aijaz, A. K., Varun, D., Ahmad, M. G, Hakim, S., Owais, M. (2007) Tuftsin augments anti tumor efficacy of liposomisedetoposide against fibrosarcoma in swiss albino mice. Molecular Medicine 13 (5-6): 266-276. [Impact Factor: 5.90]

138. Khan, A., Shukla, Y., Kalra, N., Alam, M., Ahmad, M. G, Hakim, S., Owais, M. (2007) Potential of diallyl sulfide bearing pH sensitive liposomes in chemoprevention of DMBA induced skin papilloma. Molecular Medicine13: 443-451. [Impact Factor: 5.90]

139. Mallick, A.I., Singha, H.S., Chaudhuri, P., Ahmad Nadeem, Khan SA, Khurshid Ahmad Darr, Owais, M. (2007) Protection of BALB/c mice against Brucellaabortus544 challenge by liposomal delivery of ribosomal recombinant L_7/L_{12} protein. Vaccine 25: 3692-3704. [Impact Factor: 3.60]

140. Sharma S. K., Gupta, C. M., Dwivedi, V. Bhattacharya, S., Owais, M. (2007) Prophylactic potential of liposomised integral membrane protein of Plasmodium yoelii nigeriensis against blood stage infection in Balb/C mice. Vaccine 25: 2103-2111. [Impact Factor: 3.60]

141. Aqil, F., Ahmad, I., Owais, M. (2006) Evaluation of anti-methicillin-resistant Staphylococcus aureus (MRSA) activity and synergy of some bioactive plant extracts. Biotechnol. J. 1(10): 1093-1102 [Impact Factor: 1.2]

142. Ahmad, N., Deeba, F., Faisal, S. M., Khan, A. Agrewala, J. N., Varun, D., Owais, M. (2006) Role of escheriosomes as vaccine adjuvant against experimental murine salmonellosis. Biochimie: 88 (10):***1391-1400***. [Impact Factor: 3.40]

143. Khan M. A., Owais, M. (2006) Toxicity, stability and pharmacokinetics of amphotericin B in immunomodulatortuftsin-bearing liposomes in a murine model. J Antimicrob Chemotherapy 58(1): 125-132. [Impact Factor: 5.35]

144. Atif, S. M., Hasan, I., Ahmad, N., Khan, U., Owais, M. (2006) Fusogenic potential of sperm membrane lipids: nature's wisdom to accomplish targeted gene delivery. FEBS Letters 580(9): 2183-2190. [Impact Factor: 3.96]

145. Hamid, T. N., Khan, M. A., Owais, M. (2006) Enhanced efficacy of pH-sensitivensitive nystatin liposomes against Cryptococcus neoformans in murine model. J Antimicrob Chemotherapy 57(2): 349-352. [Impact Factor: 5.35]

146. Khan, M. A., Faisal, S. M., Owais, M. (2006). Safety, efficacy and pharmacokinetics of tuftsin-loaded nystatinliosomes in murine model. J Drug Targetting 14(4): 233-241. [Impact Factor: 2.70]

147. Ahmad N, Arif K, Faisal SM, Neyaz MK, Tayyab S, Owais M. (2006) PLGA-Microsphere mediated clearance of bilirubin in temporarily hyperbilirubinemic rats: An alternate strategy for the treatment of experimental jaundice. BiochimBiophys Acta 1760(2): 227-232. [Impact Factor: 2.95]

148. Sharma, S. K., Deba, F., Bhattacharya, S., Bajpai, P., Agarwal, A., Owais, M. (2006) Escheriosome entrapped soluble blood stage antigens impart protective immunity against a multi-drug resistant isolate of Plasmodium yoeliinigeriensis in BALB/c mice, Vaccine 24 (7): 948-956. [Impact Factor: 3.60]

149. Sharma, S. K., Dubey, A., Ahmad, N., Shazia, K., Saleem I, Garg, R. Owais, M. (2006) Non PC liposomes entrapped promastigote antigens elicit parasite specific $CD8^+$ and $CD4^+$ T-cell immune response and protects hamsters against visceral leishmaniasis Vaccine 24(11): 1800-1810. [Impact Factor: 3.60]

150. Salman Z., Owais, M. (2006) Ethanol production from crude whey by Kluyveromycesmarxianus. Biochemical Engineering Journal 27: 295-298. [Impact Factor: 1.4]

151. Khan, M. A.,Owais, M. (2005) Immunomodulator tuftsin increases the susceptibility of C. neoformans to liposomal Amp B in immunocompetent BALB/c mice. J Drug Targetting (13(7): 423-429. [Impact Factor: 2.70]

152. Bajpai, P., Anil, K. Owais, M., Sharma, S. K., Bhattacharya, S. (2005) Concomitant delivery of tetracycline and DEC against experimental filariasis. J Drug Targetting 13(6): 375-381. [Impact Factor: 2.70]

153. Masood, K. A., Hamid, N. T., Owais, M., (2005) Incorporation of Amp B in tuftsin bearing liposomes showed enhanced efficacy against systemic cryptococcosis in leucopenic mice. J. Antimicrobial Chemotherapy 56(4): 726-731. [Impact Factor: 5.35]

154. Ahmad, N., Alam, M. K., Shehbaz, A., Khan, A., Mannan, A., Rashid, S., Bisht, D., Owais, M. (2005) Antimicrobial activity of clove oil and its potential in the treatment of urogenital infections. J Drug Targetting 13(10): 555-561. [Impact Factor: 2.70]

155. Salman Z., Owais, M., Saleemuddin, M., Sattar Husain (2005) Batch kinetics and modeling of Ethanolic fermentation of whey. Int. J. Food Science Technology 40: 597-604. [Impact Factor: 1.0]

156. Khan M. A., Ahmad, N., Moin, S., Mannan, A., Wajahul, H., Pasha, S.T., Khan, A., Owais, M. (2005) Tuftsin-mediated immunoprophylaxis against an isolate of Aspergillus fumigatus shows less in vivo susceptibility to Amp B. FEMS Immunol & Med Microbiology 44: 269-276. [Impact Factor: 2.55]

157. Deba, F.; Tahseen, H. Nasti; Ahmad, N.; Sharad, S. K.; Akhtar, S.; Saleemuddin, M., Owais, M. (2005) Phospholipid diversity: correlation with membrane–membrane fusion events. Biochim Biophys. Acta (Biomembrane) 1669: 170-181. [Impact Factor: 4.31]

158. Mittal, M.K., Mishra, S., Owais, M., Goyal, N. (2005) Expression, purification and characterization of Leishmania donovani trypanothione reductase in E. coli. Protein Expression and Purification 40: 279-286. [Impact Factor: 1.7]

159. Owais, M., Sharad, K. S., Shehbaz, A. Saleemuddin, M. (2005) Antibacterial efficacy of ashwagandha an indigenous medicinal plant against experimental murine salmonellosis. Phytomedicine 12: 229-235. [Impact Factor: 2.70]

160. Aqil, F., Sajjad, MAK., Owais, M., Ahmad, I. (2005) Effect of certain bioactive plant extracts on clinicalisolates of β–Lactamase producingmethicillinresistant Staphylococcus aureus. J. Basic Microbiology 45 : 1144-1146. [Impact Factor: 1.81]

161. Khan, M. A., Jabeen, R., Nasti, T. H., Owais, M. (2005) Enhanced anticryptococcal activity of chloroquine in phosphatidyl-serinecontaining liposomes in a murine model. J Antimicrob. Chemother. 55 : 223-228. [Impact Factor:5.35]

162. Masood, K. A., Jabeen, R., Owais, M. (2004) Prophylacticrole of liposomized chloroquine against murine cryptococcosisless susceptible to fluconazole. Pharm. Research 21 : 2207-2212. [Impact Factor: 4.80]

163. Masood, A. K., Feroz, M., Rukhsana, J., Owais, M. (2004) Prophylactic role of immunomodulators in treatment of systemic candidiasis in leukopenic mice. J Drug Targetting 12: 425-433. [Impact Factor: 2.70]

164. Masood, A. K., Siddiqui, M. U., Moin, S., Faizi, A. F., Tayyab, S., Owais, M. (2004) Liposome-bilirubin interaction: A novel strategy to eliminate bilirubin from systemic circulation. J Liposome Research 14: 111-122. [Impact Factor: 1.80]

165. Masood, A. K., Nasti, H. T., Saima, K., Mallick, A. I., Firoz, A., Wajahul, H., Ahmad, N., Owais, M., (2004) Co-administration of Immunomodulatortuftsin and Liposomisednystatin can combat less susceptible C. albicans infection in temporarily neutropenic mice. FEMS Microbiology & Immunology 41: 249-258. [Impact Factor: 2.55]

166. Owais, M., Shailja-Misra-Bhattacharya, Haq, W., Gupta, C. M. (2003) Immunomodulatortuftsin augments anti-filarial activity of diethylcarbamazine against experimental murine filariasis. J. Drug Targetting 11: 247-251. [Impact Factor: 2.70]

167. Masood, A. K. Faisal, S. M., Nasti, HT, Saima, K., Haq, W., Shehbaz, A., Owais, M., (2003) Use of tuftsin bearing nystatin liposomes against an isolate of Candida albicans showing less susceptibility to Amp B. J. Drug Targetting 11: 93-99. [Impact Factor: 2.70]

168. Faisal, S. M.; Masood, A. K.; Tahseen, N. H.; Ahmad, N.; Owais, M. (2003) Antigen entrapped in the escheriosomes leads to the generation of $CD4^+$ helper and $CD8^+$ cytotoxic T cell response. Vaccine21: 2383-2393. [Impact Factor: 3.60]

169. Masood, A.K.; Faisal, S. M.; Khan, M. M.; Nadeem, A., Siddiqui, M.U., Owais, M. (2002) Binding of bilirubin with Albumin coupled liposomes: Implications in the treatment of jaundice. Biochim. Biophys. Acta(Biomembrane)1564: 219-226. [Impact Factor: 4.31]

170. Masood, A. K.; Faisal, S. M.; Haq, W.; Owais, M. (2002) Immunomodulatortuftsin augments anti-fungal activity of Amphotericin B against experimental murine candidiasis. J. Drug Targetting 10: 185-192. [Impact Factor: 2.70]

171. Rashid, H., Owais, M., Tayyab, S. (2001) Bilirubin binding to normal and modified human erythrocyte membranes: Effect of Phospholipases, neuraminidase, trypsin and calcium chloride. Mol. Cell. Biochem. 228: 15-23. [Impact Factor: 1.0]

172. Ahmad, N. Khan, M.A., Owais, M. (2001) Fusogenic potential of prokaryotic membrane lipids: Implication in vaccine development. FEBS J. 268: 5667-5675. [Impact Factor: 3.64]

173. Hina, Y., Owais, M., Rao, D.N., Saleemuddin, M. (2001) Stabilization of pancreatic ribonuclease A by immobilization on Sepharose-linked antibodies that recognize the labile region of the enzyme. Biochim. Biophys. Acta 1548: 114-120. [Impact Factor: 4.38]

174. Ahmad, N., Khan, M. A., Owais, M. (2001) Liposome mediated antigen delivery leads to induction of $CD8^+$ T lymphocyte and antibody responses against V3 loop region of HIV gp120 Cellular Immunol. 210: 49-55. [Impact Factor: 2.6]

175. Owais, M., Khan, M. A., Agrewala, J.N., Bisht, D., Gupta, C.M., (2001) Delivery of the antigen entrapped in the yeast lipid vesicles leads to the generation of $CD4^+$ Th2 and $CD8^+$ CTL cell response. Scand. J. Immunol. 54: 125-132. [Impact Factor: 2.10]

176. Owais, M., Gupta, C.M. (2000) Yeast vesicles as carriers for introducing macromolecules into cytoplasmic compartment of adherent cells. Eur. J. Biochem. 267: 3946-3956. [Impact Factor: 3.84]

177. Owais, M., Arya, S.K. (1999) Antiviral chemokines: intracellular life of recombinant C-C chemokine RANTES. J. Hum. Virol. 2: 270-282. [Impact Factor: 1.8]

178. Al-Harthi, L., Owais, M., Arya, S.K. (1998). Molecular inhibition of HIV Type 1 by HIV Type 2: Effectiveness in peripheral blood mononuclear cells. Aids Research and Human Reteroviruses 14: 59-63. [Impact Factor: 3.2]

179. Agrewala, J.N., Owais, M., Gupta, C.M. and Mishra,G.C. (1996). Antigen incorporation into liposomes results in the enhancement of IL-1, IL-4 and IgG-1 secretion: An evidence for preferential expansion of Th-2 cells. Cytokine Molecular Therapy 2: 59-65. [Impact Factor: 1.70]

180. Owais, M., Varshney, G.C., Choudhury, A., Chandra, S., and Gupta, C.M. (1995). Chloroquine encapsulated in malaria-infected erythrocyte specific antibody bearing liposomes effectively controls Chloroquine resistant Plasmodium berghei infections in mice. Antimicrobial agent & Chemotherapy 39: 180-184. [Impact Factor: 4.80]

181. Owais, M., Ahmad, I., Krishnakumar, B., Jain, R.K., Bachhawat, B.K and Gupta, C.M. (1993). Tuftsin-bearing liposomes as drug vehicles in the treatment of experimental aspergillosis. FEBS Letters 326: 56-58. [Impact Factor: 3.86]

b) Articles (not abstracts) published in seminars, symposia, conference volumes:

1. Singh, A. M., **Owais, M** and Varshney, G.C., (1993). Use of specific polyclonal antibodies for site-specific drug targeting to malaria erythrocytes in vivo, **Indian J. Biochem.Biophys**. (special issue) 30: 411-413.
2. Ansari, N. A., M **Owais, M**. (2006) Immunoglobulin heavy and light chain isotypes in multiple myeloma patients. **Asian Pacific journal of cancer prevention**, 8 (4): 593-596.
3. Arif Khan, Ejaj Ahmad, Maroof Alam, Azmat, Ali Khan, Arun Chauhan, Fatima Nishat, Gato Manzoor Ahmad, **Owais M**. (2009) Protective effect of liposomal formulation of tuftsin a naturally occurring tetrapeptide against cyclophosphamide-induced genotoxicity and oxidative stress in Swiss albino mice. Ind. J. Biochem.Biophys (special issue) 46: 45-52.
4. Khan, S. A., Aslam, M., **Owais, M**., Zaheer, M. S. (2010) Correlation between HS-CRP and other co-variates and different grades of blood pressure in essential hypertensive patients. Biomedical Research 21 (2): 184-188.
5. Nooralam Ansari, Asif Hasan, **Owais, M**. (2012) A study of inflammatory markers and their correlation with severity, in patients with chronic heart failure. Biomedical Research 2012; 23 (3): 408-415.
6. Shazia, A., Shagufta, M., **Owais, M**., M.U. Siddiqui (2013) Antioxidant activity of thymol: protective role in AAPH-induced hemolysis in diabetic erythrocytes **International Journal of Pharmaceutical Science Invention** 2: 55-60.

iii) ***Scientific Reviews:***

1. Azhar, Mohammad A Wali, Qudsia Rashid, Wajihul Hasan Khan, Khaled Al-Hosaini, Owais, M., Mohammad Amjad Kamal (2023) Crosstalk between SARS-CoV-2 Infection and Neurological Disorders: A Review **CNS & Neurological Disorders-Drug Targets**: 22(5), 643-658. (Impact Factor: 2.82)
2. Khan FB, Uddin S, Elderdery AY, Goh KW, Ming LC, Ardianto C, Palakot AR, Anwar I, Khan M, **Owais M**, (2022) Illuminating the Molecular Intricacies of Exosomes and ncRNAs in cardiovascular diseases: Prospective Therapeutic and Biomarker Potential. ***Cells***: 11(22):3664. https://doi.org/10.3390/cells11223664 (Impact Factor: 6.6)
3. Farheen Badrealam Khan, Parul Singh, Yahya F Jamous, Syed Azmal Ali, Mohammad Owais, Chih Yang Huang, Venkatesh Chanukuppa, (2022) Multifaceted pharmacological potentials of curcumin, genistein, and tanshinone IIA through proteomic approaches: an in-depth review Cells: 15 (1) 249 (Impact Factor: 6.6)
4. Khan N, Umar MS, Haq M, Rauf T, Zubair S, **Owais M**. Exosome-encapsulated ncRNAs: Emerging yin and yang of tumor hallmarks. **Frontiers in Genetics** 2022 Oct 20;13:1022734. doi: 10.3389/fgene.2022.1022734. PMID: 36338993; PMCID: PMC9632295 (Impact Factor: 4.37).
5. Alshameri AW, **Owais M** (2022) Antibacterial and cytotoxic potency of the plant-mediated synthesis of metallic nanoparticles Ag NPs and ZnO NPs. Open Nano: 8, 100077 (Impact Factor: 9.50)
6. Asim Azhar, WH Khan, PA Khan, K Al-Hosaini, **M Owais**, A Ahmad (2022) Mucormycosis and COVID-19 pandemic: Clinical and diagnostic approach. **Journal of Infection and Public Health:** 15 (4), 466-479 (Impact Factor: 3.32).
7. S Farheen, S Agrawal, S Zubair, A Agrawal, F Jamal, I Altaf, A Kashif Anwar, SM Umair, **M Owais** (2021) Patho-Physiology of Aging and Immune-Senescence: Possible Correlates With Comorbidity and Mortality in Middle-Aged and Old COVID-19 Patients. **Frontiers in Aging** 2:748591. doi: 10.3389/fragi.2021.748591

8. Azhar A, Al-hosaini K, Khan PA, Oanz AM, Zia Q, Banawas S, Dong JJ, Kamal MA, **Owais M**. Promiscuous biological features of newly emerged SARS-CoV-2 facilitate its

unrestrained outbreak: an update. **Coronaviruses**. 2021; 2:1-6.Azhar A, Ahmad E, Zia Q, Owais M, Ashraf GM. (2016) Recent updates on molecular genetic engineering approaches and applications of human therapeutic proteins. Curr. Protein Pept Sci. 2016.

9. Ashraf GM, Azhar A, Ali A, Rehan M, Zia Q, **Owais M**, Alexiou A, Rauf A, Ganash M, Kamal MA. (2018) Relationship between CNS and immunology, in relation to psychology. **Curr Drug Metab**. 29. doi: 10.2174/1389200219666180129142534. [Epub ahead of print] [IF 2.6]
10. Saqib U, Sarkar S, Suk K, **Owais**, M., Baig MS, Savai R. (2018) Phytochemicals as modulators of M1-M2 macrophages in inflammation. **Oncotarget**. 3;9 (25):17937-17950. doi: 10.18632/oncotarget. [IF 3.4]
11. Asim Azhar, Ambreen Irshad Ahmad, Qamar Zia, Mohd. Ahmar Rauf, **Mohammad Owais**, Ghulam Md Ashraf (2017) Relationship between CNS and immunology, in relation to psychology. Current **Drug Metabolism**. [IF 2.6]
12. Azhar, Ejaj Ahmad, Qamar Zia, Mohd. Ahmar Rauf, **Mohammad Owais,** Ghulam Md Ashraf. Recent advances in the development of novel protein scaffolds based therapeutics. Asim **Int J Biol Macromol**. 2017 Apr 13; 102:630-641. doi:10.1016/j.ijbiomac.2017.04.045.[IF 3.8]
13. Zia Q, Azhar A, Kamal MA, Aliev G, Owais M, Ashraf GM (2016). Super aggregated form of Amphotericin B: a novel way to increase its therapeutic index. Curr Pharm Des. 22(7):792-803. (Impact Factor: 2.84)
14. Owais M, Zubair S, Agrawal A, Chang YF. (2015) Cancer Immunology and Immunotherapy. Biomed Res Int. 2015: 393454. doi: 10.1155/2015/393454. (Impact Factor: 2.65)
15. ***Badrealam KF, Zubair S, Owais M (2015) SiRNA nanotherapeutics _the panacea of diseases? Current Gene Therapy 15(2): 201-14. (Impact Factor: 4.90)***
16. ***Targeted drug delivery to macrophages in parasitic infections. Owais M, Gupta CM. (2005). Curr Drug Delivery 2(4): 311-318.***
17. Saba, T., Khan F. B., Owais, M., Zubair, S. (2013) Illuminating the Petite Picture of T Cell Memory Responses to Listeria monocytogenes. BioMed Research International, Article ID 121684, doi.org/10.1155/2013/121684

18. Badrealam KF, Owais M. (2015) Nano-Sized Drug Delivery Systems: Development and Implication in Treatment of Hepatocellular Carcinoma. Dig Dis. 2015 Sep; 33(5): 675-682. (Impact Factor: 2.18)
19. Badrealam, KF, Owais, M (2014) Multifunctional nanosystems: growing sanguinity in siRNA therapy, International Journal of Nanomedicine 9: 1771-1773. [Impact factor 4.21]

i) **Other publications (poster presentation**):

- Paper entitled as “Liposome in treatment of infectious diseases” was presented in Second Chandigarh Symposium on “New Biology” at IMTECH, Chandigarh during March 22-23, 1993.
- AIDSLINE ICA12/98385118. Meeting Jan 1998. National Cancer Institute, National Institute of Health, Bethesda, MD, USA.Anti-HIV chemokines: domain mapping and HIV-2 lentivirus delivery.
- International Conference on “Current Trends in Drug Discovery Research (CTDDR)” at CDRI, Lucknow during Feb 13-17 2001 and presented poster entitled “Liposome mediated removal of bilirubin in jaundice rats.”
- 9th Asia Pacific Congress in Clinical Biochemistry, 2002 at New Delhi during March 9-14, 2002and presented a poster entitled “Binding of bilirubin with albumin coupled liposomes: Implication in treatment of jaundice.”
- Yeast 2003: An International meeting on yeast biology at IMTECH, Chandigarh during Feb 20-22, 2003 and presented poster entitled “Reconstitution of Candida albicans antigen in fusogenic yeast lipid vesicles: Implication in vaccine development.”
- Yeast 2003: An International meeting on yeast biology at IMTECH, Chandigarh during Feb 20-22, 2003 and presented poster entitled “Glyoxylate cycle enzymes as potential drug targets for treatment of intracellular infections.”

ii) **Other publications (poster presentation**):

- Paper entitled as “Liposome in treatment of infectious diseases” was presented in Second Chandigarh Symposium on “New Biology” at IMTECH, Chandigarh during March 22-23, 1993.
- AIDSLINE ICA12/98385118. Meeting Jan 1998. National Cancer Institute, National Institute of Health, Bethesda, MD, USA.Anti-HIV chemokines: domain mapping and HIV-2 lentivirus delivery.
- International Conference on “Current Trends in Drug Discovery Research (CTDDR)” at CDRI, Lucknow during Feb 13-17 2001 and presented poster entitled “Liposome mediated removal of bilirubin in jaundice rats.”
- 9th Asia Pacific Congress in Clinical Biochemistry, 2002 at New Delhi during March 9-14, 2002and presented a poster entitled “Binding of bilirubin with albumin coupled liposomes: Implication in treatment of jaundice.”
- Yeast 2003: An International meeting on yeast biology at IMTECH, Chandigarh during Feb 20-22, 2003 and presented poster entitled “Reconstitution of Candida albicans antigen in fusogenic yeast lipid vesicles: Implication in vaccine development.”
- Yeast 2003: An International meeting on yeast biology at IMTECH, Chandigarh during Feb 20-22, 2003 and presented poster entitled “Glyoxylate cycle enzymes as potential drug targets for treatment of intracellular infections.”