

General information

Mohammed Baqur S. Al-Shuhaib

**Former Chairman, Department of Genetic Engineering,
Professor of Molecular Genetics and Bioinformatics**

Phone Number: (0096) 770 711 5693

Email address (institutional): mohammed79@agre.uoqasim.edu.iq

Email Address (office): baqurahilly_79@yahoo.com

Birth: March – 25 – 1979

Language skills: Arabic language (mother tongue), English language (fluent speaker)

Academic Position: Professor/college of agriculture – Al-Qasim Green University.

Present Scientific Membership:

Academic member, Department of Animal Production/ College of Agriculture / Al-Qasim Green University

Location: Iraq/Babil governorate 51001/Al-Qasim Green University

 **University author profile:** <https://www.uoqasim.edu.iq/people/126>

 **Google Scholar profile:** <https://scholar.google.com/citations?user=VEyTA70AAAAJ&hl=en>

 **Scopus Author profile:** <https://www.scopus.com/authid/detail.uri?authorId=57196042036>

 **Publons profile:** <https://www.webofscience.com/wos/author/record/D-5710-2019>

 **ORCID ID profile:** <https://orcid.org/0000-0002-6458-2068>

Occupied administrative positions

(2011) Membership of Nucleic Acids Research Center – Babylon University.

(2012) Assistant Dean-college of biotechnology/Al-Qasim Green University

(2013 - 2014) Chairman/ dept. of genetic engineering-college of biotechnology/Al-Qasim Green University

(2014 – present) The academic staff member/department of Animal production-College of Agriculture/Al-Qasim Green University

Academic history

B.Sc., University of Babylon – Biology dept.

M.Sc., Baghdad University – Biotechnology dept. – Molecular Genetics

Ph.D., University of Babylon – Biology dept. – Molecular Genetics

Office Address

Iraq – Babylon governorate – Al-Qasim Green University/college of Agriculture/ Dept. of Animal Resources

Research Interests

Molecular genetics, SNP, *in silico* computation of genetic polymorphisms, Computer Aided Drug Design, Medicinal Chemistry

Description of Research activities

Mohammed Baqur S. Al-Shuhaib is a professor specializing in molecular genetics and bioinformatics. His research encompasses various areas of molecular biology, drug design, and computational biology, with particular emphasis on predicting the impact of single nucleotide polymorphisms (SNPs) on protein structure, function, and stability. His findings have been predominantly published in prestigious and well-established journals within these fields. These publications leverage cutting-edge molecular genetics and bioinformatics techniques to study the genomics of various species, with applications in conservation genetics, disease diagnostics, and evolutionary biology. He usually use molecular docking to predict the impacts of the genetic variations on the biological activity of this protein upon mutation. Accordingly, highly important insights in to the observed differences in the severity of the metabolic pathway in which this altered protein is involved is obtained. He is familiar with exploiting the docking tool, followed by AMET and MD simulation, in computer-aided drug design. In addition to numerous state-of-the-art *in silico* tools, molecular docking can be exploited in the prediction of the impact of the SNP on protein structure, function, and interactions with receptors. On the other hand, some of these skills can be exploited to unravel the possible association between the identified SNP(s) and variable phenotypic traits in the living organisms to identify the potential economic importance of the SNP in the measured traits. This SNP knowledge has also be employed in variable clinical diagnostics aspects. In addition to having published more than sixty-five papers indexed in the Web of Science, he serves as a reviewer for over sixty-six esteemed journals across diverse fields of expertise

SCOPUS-indexed Published Papers

1. **Al-Shuhaib M.B.S.A.** 2017. A Universal, rapid, and inexpensive method for genomic DNA isolation from the whole blood of mammals and birds. *Journal of Genetics* 96 (1): 171-176. <https://doi.org/10.1007/s12041-017-0750-6> 
2. **Al-Shuhaib M.B.S.,** Al-Fihan R.A., Al-Qutbi A.A., Al-Thuwaini T.M. 2017. Potential consequences of *DGAT2* and *BTN* genes polymorphism in Iraqi Holstein cattle. *Scientia Agriculturae Bohemica* 48 (3): 127-141. <https://doi.org/10.1515/sab-2017-0020>
3. **Al-Shuhaib M.B.S.,** Albakri A.H., Alwan S.L., Almandil N.B., AbdulAzeez S., Borgio J.F. 2018. Optimal PCR primers for rapid and accurate detection of *Aspergillus flavus* isolates. *Microbial Pathogenesis* 116: 351-355. <https://doi.org/10.1016/j.micpath.2018.01.049> 
4. Mustafa K.M., Ewadh M.J., **Al-Shuhaib M.B.S.,** Hasan H.G. 2018. The *in silico* prediction of the chloroplast maturase K gene polymorphism in several barley varieties. *Agriculture (Poľnohospodárstvo)*, vol. 64(1): 3–16. <https://doi.org/10.2478/agri-2018-0001>



5. **Al-Shuhaib M.B.S.**, Al-Kafajy F.R., Badi M.A., AbdulAzeez S., Marimuthu K., Al-Juhaishi H.A.I., Borgio J.F. 2018. Highly deleterious variations in *COX1*, *CYTB*, *SCG5*, *FK2*, *PRL* and *PGF* genes are the potential adaptation of the immigrated African ostrich population. *Computers in Biology and Medicine* 100: 17– 26. <https://doi.org/10.1016/j.complbiomed.2018.06.019> WEB OF SCIENCE
6. **Al-Shuhaib M.B.S.**, Al-Lamy S.M.A., Al-Tayy H.M.A., Al-Thuwaini T.M., Radhi A.H. 2018. Single Nucleotide Polymorphism (SNP) of leptin gene in holstein cattle [การแปรผันของลำดับดีเอ็นเอชนิดหนึ่ง (สไนป์, SNP) ของยีนเลปติน ในโคนมโฮลสไตน์]. *Thai Journal of Veterinary Medicine* 48(2), 187-201. <https://he01.tci-thaijo.org/index.php/tjvm/article/view/137525/102357> WEB OF SCIENCE
7. **Al-Shuhaib, M.B.S.** 2018. A minimum requirements method to isolate large quantities of highly purified DNA from one drop of poultry blood. *Journal of Genetics* 97 (4): e87–e94. <https://doi.org/10.1007/s12041-018-0983-z> WEB OF SCIENCE
8. Al-Kafajy F.R., **Al-Shuhaib, M.B.S.**, Al-Jashami G.S., Al-Thuwaini T.M. 2018. Comparison of Three Lines of Japanese Quails Revealed a Remarkable Role of Plumage Color in the Productivity Performance Determination. *Journal of World's Poultry Research* 8(4): 111-119. url: <http://oaji.net/articles/2019/2246-1564421391.pdf>
9. **Al-Shuhaib, M.B.S.**, Al-Kaaby, H.N., Alwan, S.L. 2019. A highly efficient electrophoretic method for discrimination between two *Neoscytalidium* species using a specific fungal internal transcribed spacer (ITS) fragment. *Folia Microbiologica* 64(2): 161-170. <https://doi.org/10.1007/s12223-018-0641-0> WEB OF SCIENCE
10. Al-Dabbagh, N.N., Hashim, H.O., **Al-Shuhaib, M.B.S.** 2019. A highly efficient computational discrimination among Streptococcal species of periodontitis patients using 16S rRNA amplicons. *Korean Journal of Microbiology* 55(1):1-8. <https://doi.org/10.7845/kjm.2019.8107>
11. **Al-Shuhaib, M.B.S.**, Al-Thuwaini, T.M., Al-Fihan, R.A., Al-Qutbi, A.A., 2019. Genotyping of *Diacylglycerol Acyltransferase 2* Gene in Holstein Cattle Population. *Agriculturae Conspectus Scientificus* 84(2):211-218. <https://hrcak.srce.hr/221766>
12. Hashim, H.O., **Al-Shuhaib, M.B.S.**, Ewadh M.J. 2019. Heterogeneity of proteins in birds' egg-whites. *Biotropia* 26(2):65-81. <https://doi.org/10.11598/btb.2019.26.2.812>
13. **Al-Shuhaib, M.B.S.**, Al-Thuwaini, T.M., Fadhil, I.A., Aljobouri, T.R.S. 2019. *GHRL* gene-based genotyping of ovine and caprine breeds reveals highly polymorphic intronic sequences in Awassi sheep with several RNA motifs. *Journal of Genetic Engineering and Biotechnology* 17:3. <https://doi.org/10.1186/s43141-019-0004-5> WEB OF SCIENCE
14. Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2019. The Effects of Grass-Based versus Grain-Based Feeding of Ruminants on the Human Hygienic Status, a Review. *World's Veterinary Journal* 9(3): 174-180. <https://doi.org/10.36380/sci.2019.vwj22>
15. **Al-Shuhaib, M.B.S.**, Al-Kafajy F.R., Al-Jashami G.S. 2019. A computational approach for explaining the effect of the *prl* gene polymorphism on prolactin structure and biological activity in Japanese quails. *Animal Biotechnology*, <https://doi.org/10.1080/10495398.2019.1683568> WEB OF SCIENCE
16. Hussein, T.H., **Al-Shuhaib, M. B. S.**, Al-Thuwaini, T. M. 2019. Efficiency of W Chromosome- Based Gender Determination in Japanese Quails. *Indian Veterinary Journal* 96(11): 36-39. <https://ivj.org.in/journal-article-viewer/9b0984a0-125a-42a7-a8aa-4fcc46722704/>
17. **Al-Shuhaib, M.B.S.** 2019. D76V, L161R, and C117S are the most pathogenic amino acid substitutions with several dangerous consequences on leptin structure, function, and stability. *Egyptian Journal of Medical Human Genetics* 20: 32. <https://doi.org/10.1186/s43042-019-0033-2> WEB OF SCIENCE
18. Sarhan, R. S, Hashim, H.O., **Al-Shuhaib, M.B.S.** 2019. The Gly152Val mutation possibly confers resistance to beta-lactam antibiotics in ovine *Staphylococcus aureus* isolates. *Open Veterinary Journal* 9(4): 339-348. <https://doi.org/10.4314/ovj.v9i4.12> WEB OF SCIENCE
19. **Al-Shuhaib, M. B. S.** 2019. A comprehensive *in silico* prediction of the most deleterious missense variants in the bovine *LEP* gene. *Biotechnologia* 100(4): 429-439. <https://doi.org/10.5114/bta.2019.90244>
20. **Al-Shuhaib, M. B. S.** 2019. Deleterious amino acid substitutions with a series of putative damaging effects on egg components are revealed in the ovalbumin gene family; an *in silico* approach. *Nova Biotechnologica et Chimica* 18(2): 1-9. <https://doi.org/10.2478/nbec-2019-0014>
21. Hashim, H.O., **Al-Shuhaib, M.B.S.** 2019. Exploring the Potential and Limitations of PCR-RFLP and PCR-SSCP for SNP Detection: A Review. *Journal of Applied Biotechnology Reports* 6(4):137-144. <https://doi.org/10.29252/JABR.06.04.02>
22. Al-Dabbagh, N.N., Al-Janabi, W.H., **Al-Shuhaib, M.B.S.** 2019. Identification of *Candida* species using 26S ribosomal RNA gene sequencing in patients with periodontitis. *Journal of Bacteriology and Virology* 49(4):212-220. <https://doi.org/10.4167/jbv.2019.49.4.212>
23. Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.**, Hussein, Z.M. 2020. A novel T177P missense variant in the HSPA8 gene associated with the low tolerance of Awassi sheep to heat stress. *Tropical Animal Health and Production* 52: 2405-2416. <https://doi.org/10.1007/s11250-020-02267-w> WEB OF SCIENCE
24. **Al-Shuhaib M.B.S.**, Albakri A.H., Hashim H.O., Alwan S.L., Almandil N.B., Selvaraj, P., Jermy, R., AbdulAzeez S., Borgio J.F. 2020. High prevalence of aflatoxin B1 in *Aspergillus flavus* Infecting Stored Rice Grains. *Journal of Agricultural Science and Technology* 22(3): 737-745. url: <https://jast.modares.ac.ir/article-23-28280-en.pdf> WEB OF SCIENCE
25. Hussein, T.H., **Al-Shuhaib, M.B.S.**, Al-Thuwaini, T.M. 2020. Potential mitochondrial diversity role in the productivity of three lines of Japanese quails. *Biodiversitas* 21(5): 2258-2265. <https://doi.org/10.13057/biodiv/d210556>
26. Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.**, Lepretre, F., Mahdi, Z.A. 2020. Co-inherited novel SNPs of the *LIPE* gene associated with increased carcass dressing and decreased fat-tail weight in Awassi breed. *Tropical Animal Health and Production*. 52(6): 3631-3638. <https://doi.org/10.1007/s11250-020-02400-9> WEB OF SCIENCE
27. Fadhil, I.A., **Al-Shuhaib, M.B.S.** 2020. Phylogenetic differentiation between Awassi and Hamdani sheep using the mitochondrial 12S rRNA. *Animal Biotechnology*, 33(5): 801-806. <https://doi.org/10.1080/10495398.2020.1837146> WEB OF SCIENCE
28. Aljobouri T.R.S., Hassan, A.F., **Al-Shuhaib, M.B.S.**, Mahyari, S.A. 2020. Association of *GnRH1* Gene with Growth Traits in

- Two Breeds of Sheep. *Agricultural Research*, 10(2), 285-293. <https://doi.org/10.1007/s40003-020-00501-3> WEB OF SCIENCE
29. Albakri A.H., **Al-Shuhaib M.B.S.**, Alwan S.L., AbdulAzeez S., Borgio J.F. 2020. Deleterious missense variants in the aflatoxin biosynthesis genes explain the low toxicity of *Aspergillus flavus* from infected rice. *Microbial Pathogenesis*. 104605 <https://doi.org/10.1016/j.micpath.2020.104605> WEB OF SCIENCE
 30. Hashim, H.O., Mohammed, M.K., Mousa, M.J., Abdulameer, H.H., Alhassnawi, A.T., Hassan, S.A., **Al-Shuhaib, M.B.S.** (2020). Infection with different strains of SARS-COV-2 in patients with COVID-19. *Archives of Biological Sciences*. 72(4): 575-585. <https://doi.org/10.2298/ABS201024051H> WEB OF SCIENCE
 31. **Al-Shuhaib, M.B.S.**, 2020. The Deleterious F109S Mutation Disrupts Binding of Sex-Determining The Deleterious F109S Mutation Disrupts Binding of Sex-Determining Region Y with DNA. *Karbala International Journal of Modern Science*. 6(4): 385-395. <https://doi.org/10.33640/2405-609X.2082>
 32. Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.**, Lepretre, F., Dawud, H.H., 2020. Two co-inherited novel SNPs in the *MC4R* gene related to live body weight and hormonal assays in Awassi and Arabi sheep breeds of Iraq. *Veterinary Medicine and Science*. 7(3):897-907. <https://doi.org/10.1002/vms3.421> WEB OF SCIENCE
 33. Aljubouri T.R.S., **Al-Shuhaib, M.B.S.**, Javadmanesh, A. 2020. *HMG2* gene polymorphisms and their effects on main growth traits indices in Awassi and Karakul sheep. *Agriculture and Natural Resources*. 54: 587–594. <https://doi.org/10.34044/j.anres.2020.54.6.03>
 34. Mohammed, A.K., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2021. Single nucleotide polymorphism rs7908486 of the *TCF7L2* gene is highly associated with obesity in the Iraqi population. *Archives of Biological Sciences*. 72(4): 575-585. <https://doi.org/10.2298/ABS201213056M> WEB OF SCIENCE
 35. **Al-Shuhaib, M.B.S.**, Al-Shuhaib, J.M.B. 2021. Integrating state-of-the-art *in silico* tools with molecular docking to predict the impact of the most deleterious amino acid substitutions on TRAPPC6A protein. *Current Science*. 120: 398-405. <https://doi.org/10.18520/cs/v120/i2/398-405> WEB OF SCIENCE
 36. Musafir KNJ, Huyop FZ, Ewadh MJ, Supriyanto E, Al-Thuwaini TM, **Al-Shuhaib MBS**. 2021. The single nucleotide polymorphisms rs11761556 and rs12706832 of the leptin gene are associated with type 2 diabetes mellitus in the Iraqi population. *Archives of Biological Sciences*. 73(1):93-101 <https://doi.org/10.2298/ABS210129005M> WEB OF SCIENCE
 37. Aljubouri T.R.S., **Al-Shuhaib, M.B.S.** 2021. Genotyping of mitochondrial D-loop sequences in three breeds of sheep. *Biologia* 76(1): 203-211. <https://doi.org/10.2478/s11756-020-00543-6> WEB OF SCIENCE
 38. Imran, F.S., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.**, Lepretre, F. 2021. A Novel Missense Single Nucleotide Polymorphism in the *GREM1* Gene is Highly Associated with Higher Reproductive Traits in Awassi Sheep. *Biochemical Genetics*. 59: 422-436. <https://doi.org/10.1007/s10528-020-10006-x> WEB OF SCIENCE
 39. Ali, N.A.L., **Al-Shuhaib, M.B.S.** 2021. Highly effective dietary inclusion of laurel (*Laurus nobilis*) leaves on productive traits of broiler chickens. *Acta Scientiarum - Animal Sciences*. 43: e52198. <https://doi.org/10.4025/actascianimsci.v43i1.52198>
 40. Badi, M.A., **Al-Shuhaib M.B.S.**, Aljubouri T.R., Al-Thuwaini T.M., Dawud H.H., Hussein T.H., Al-Nafii A.T., Abdulmalek D., Altamemi M.K., Fadhil I.A., Albakri A.H. 2021. Rapid and optimized protocol for efficient PCR-SSCP genotyping for wide ranges of species. *Biologia* 76, 2413–2420. <https://doi.org/10.1007/s11756-021-00776-z> WEB OF SCIENCE
 41. Aljubouri T.R.S., Hassan, A.F., **Al-Shuhaib, M.B.S.** 2021. Remarkable correlation of non-genetic factors with growth traits in two breeds of sheep. *Iraqi Journal of Agricultural Sciences*, 52(2): 309-314. <https://doi.org/10.36103/ijas.v52i2.1292> WEB OF SCIENCE
 42. Al-Nafie, T., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2021. A novel association between hemoglobin subunit beta gene and reproductive performance in Awassi ewes. *Journal of the Saudi Society of Agricultural Sciences*, 21(1): 1-7. <https://doi.org/10.1016/j.jssas.2021.06.018>
 43. Mohammed M.H., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2021. The Association of the Single-and Twin-Bearing with the Lipid Profile on the Status of the Reproductive Hormones in Iraqi Awassi Ewes. *Advances in Animal and Veterinary Sciences*. 9(9): 1456-1459. <http://dx.doi.org/10.17582/journal.aavs/2021/9.9.1456.1459>
 44. Mohammed M.M., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2021. Association of OLR1 Polymorphism with Lipid Profile Levels and lipid ratio of Iraqi Awassi Ewes. *Advances in Animal and Veterinary Sciences*. 9(9): 1460-1465. <http://dx.doi.org/10.17582/journal.aavs/2021/9.9.1460.1465>
 45. Mohammed, M.H., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2021. High association of a novel variant in the adiponectin gene with the litter size in Awassi ewes. *Journal of the Saudi Society of Agricultural Sciences*. 21(5):296-301. <https://doi.org/10.1016/j.jssas.2021.09.007>
 46. Al-Thuwaini, T.M., Aljubouri, T.R.S., **Al-Shuhaib, M.B.S.**, Mahyari, S.A. 2021. The Effect of Two Novel Amino Acid Substitutions of *BMP15* Gene on Ovulation Rate in Awassi Ewes. *Proceeding National Academy of Science, India, Section B Biological Sciences*, 92(1): 49-55. <https://doi.org/10.1007/s40011-021-01296-1>
 47. Aljubouri, T.R.S., Hassan, A.F., **Al-Shuhaib, M.B.S.** 2021. Novel association between *GnRHR* and growth traits in Awassi and Karakul sheep. *Journal of Microbiology, Biotechnology, and Food Sciences*. <https://doi.org/10.55251/jmbfs.3241> WEB OF SCIENCE
 48. Ali, D.A., **Al-Shuhaib, M.B.S.**, Farhadi, G., Al-Kafajy, F.R., Al-Thuwaini, T.M. and Esmailzadeh, A., 2021. Detection of a novel single nucleotide polymorphism in *IGF2* gene with a negative impact on egg production and body weight in Japanese quail (*Coturnix japonica*). *Journal of Genetic Engineering and Biotechnology*, 19(1), pp.1-9. <https://doi.org/10.1186/s43141-021-00271-7> WEB OF SCIENCE
 49. Aljubouri, T.R., Al-Khafaji, F.M., **Al-Shuhaib, M.B.S.** 2021. Relationship of some metabolic Hormones with Increased Live Body Weight of Male and Female of Karakul and Awassi Lambs. *Basrah Journal of Agricultural Sciences*. 3;34(2):107-17. <https://doi.org/10.37077/25200860.2021.34.2.09>
 50. **Al-Shuhaib, M.B.S.**, Hashim, H.O., Al-Shuhaib, J.M., 2022. *In silico* Discovery of a New Potent Inhibitor for Sterol 14-alpha

- Demethylase as a Promising Antifungal Drug against *Aspergillus fumigatus* Infection. *Biointerface Research in Applied Chemistry*, 12(5), 5785 – 5796. <https://doi.org/10.33263/BRIAC125.57855796> WEB OF SCIENCE
51. **Al-Shuhaib, M.B.S.**, Hashim, H.O., Al-Shuhaib, J.M., 2022. Epicatechin is a promising novel inhibitor of SARS-CoV-2 entry by disrupting interactions between angiotensin-converting enzyme type 2 and the viral receptor binding domain: A computational/simulation study. *Computers in Biology and Medicine*, 141, 105155. <https://doi.org/10.1016/J.COMPBIOMED.2021.105155> WEB OF SCIENCE
 52. **Al-Shuhaib, M.B.S.**, Hashim, H.O., Al-Shuhaib, J.M., Obayes, D.H. 2022. Artecainin of *Laurus nobilis* is a novel inhibitor of SARS-CoV-2 main protease with highly desirable druglikeness. *Journal of Biomolecular Structure & Dynamics*, 12(5): 5785-5796. <https://doi.org/10.1080/07391102.2022.2030801> WEB OF SCIENCE
 53. **Al-Shuhaib, M.B.S.**, Hashim, H.O., Al-Shuhaib, J.M., 2023. Most deleterious missense variants of angiotensin-converting enzyme 2 gene have extremely low frequencies and a little impact on the binding affinity with the SARS-CoV-2 spike. *Biointerface Research in Applied Chemistry*, 13, 2, 181. <https://doi.org/10.33263/BRIAC132.181> WEB OF SCIENCE
 54. Mohammed M.M., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2022. A novel p.K116Q SNP in the OLR1 gene and its relation to fecundity in Awassi ewes. *Theriogenology*, 184; 185 – 190. <https://doi.org/10.1016/j.theriogenology.2022.03.014> WEB OF SCIENCE
 55. Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2022. Variants of the SCD gene and their association with fatty acid composition in Awassi sheep. *Molecular Biology Reports*. <https://doi.org/10.1007/s11033-022-07606-8> WEB OF SCIENCE
 56. **Al-Shuhaib, M.B.S.**, 2022. Prediction of the most deleterious missense variants of human somatostatin gene by combining computational algorithms, molecular docking, and dynamic simulations. *Journal of Applied Biotechnology Reports*, 9(2): 582-595. <https://doi.org/10.30491/JABR.2021.286164.1380>
 57. Abd Ali Al-Hadi A. B., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.** 2022. Association of FST Gene Polymorphism and Litter Size with Reproductive Hormones in Iraqi Awassi Ewes During Pregnancy and Postpartum. *Advances in Animal and Veterinary Sciences*. 10(8): 1868-181873. <https://dx.doi.org/10.17582/journal.aavs/2022/10.8.1868.1873>
 58. Lawi, Z.K., **Al-Shuhaib, M.B.S.**, Amara, I.B. 2022. The rs1801280 SNP is associated with non-small cell lung carcinoma by exhibiting a highly deleterious effect on N-acetyltransferase 2. *Journal of Cancer Research and Clinical Oncology*. <https://doi.org/10.1007/s00432-022-04332-3> WEB OF SCIENCE
 59. Lawi, Z.K., **Al-Shuhaib, M.B.S.**, Amara, I.B., Alkammass, A.H. 2022. Two missense variants of the epidermal growth factor receptor gene are associated with non small cell lung carcinoma in the subjects from Iraq. *Molecular Biology Reports*. <https://doi.org/10.1007/s11033-022-07933-w> WEB OF SCIENCE
 60. Bayraktar, M., Murat Darmuş, **Al-Shuhaib, M.B.S.** 2023. Identification of two novel SNPs in the myocyte enhancer factor 2B (MEF2B) gene and its association with growth traits in two breeds of Turkish sheep. *Small Ruminant Research*. **218**, 106867 <https://doi.org/10.1016/j.smallrumres.2022.106867> WEB OF SCIENCE
 61. Kazaal, N.A., Alghetaa, H.F., **Al-Shuhaib, M.B.S.**, Al-Thuwaini, T.M., Alkammass, A.H. 2022. A novel deleterious oxytocin variant is associated with the lower twinning ratio in Awassi ewes. *Animal Biotechnology*. <https://doi.org/10.1080/10495398.2022.2152038> WEB OF SCIENCE
 62. Ajafar, M.H., Kadhim, A.H., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.**, Hussein, T.H. 2023. Association of bone morphogenetic protein 15 and growth differentiation factor 9 with litter size in livestock: a review study. *Acta Scientiarum - Animal Sciences*. v. 45: e57927. <https://doi.org/10.4025/actascianimsci.v45i1.57927>
 63. Al-Thuwaini, T.M., Mosia, I. A., Algboori, H.L., **Al-Shuhaib, M.B.S.** 2023. An efficient, fast and inexpensive method for genomic DNA extraction of fish tissue. *Molecular Biology Reports*. <https://doi.org/10.1007/s11033-023-08317-4> WEB OF SCIENCE
 64. Alwan, H., Torabi, M., Nourani, H., **Al-Shuhaib, M.B.S.** 2023. The emergence of novel Iranian variants in sheeppox and goatpox viral envelope proteins with remarkably altered putative binding affinities with the host receptor. *Virus Genes*. <https://doi.org/10.1007/s11262-023-01987-z> WEB OF SCIENCE
 65. Aljubouri, T.R.S, **Al-Shuhaib, M.B.S.** 2023. A missense SNP in the proopiomelanocortin (POMC) gene is associated with growth traits in Awassi and Karakul sheep. *Animal Biotechnology*. <https://doi.org/10.1080/10495398.2023.2197469> WEB OF SCIENCE
 66. Aljubouri, T.R.S, **Al-Shuhaib, M.B.S.** 2023. The identification of a novel SNP in the resistin (RETN) gene associated with growth traits in Karakul and Awassi sheep. *Tropical Animal Health and Production*. <https://doi.org/10.1007/s11250-023-03595-3> WEB OF SCIENCE
 67. Al-Thuwaini, T.M., Albazi, W.J., **Al-Shuhaib, M.B.S.**, Merzah, L.H., Mohammed, R.G., Rhadi, F.A., Al-Hadi, A.B., Alkammass, 2023. A.H. A Novel c.100C > G Mutation in the FST Gene and Its Relation With the Reproductive Traits of Awassi Ewes. *Bioinformatics and biology insights*. <https://doi.org/10.1177/11779322231170988> WEB OF SCIENCE
 68. Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.**, Kadhem, A. F., Alkammass, A.H. 2023. A Missense p.Q>R234 Mutation in the Osteopontin Gene Is Associated With the Prolificacy of Iraqi Awassi Ewes. *Bioinformatics and biology insights*. <https://doi.org/10.1177/11779322231172848> WEB OF SCIENCE
 69. Kazaal, N.A., Alghetaa, H.F., Alkammass, A.H., Al-Thuwaini, T.M., Javadmanesh, A., Aljubouri, R. S., **Al-Shuhaib, M.B.S.** 2023. One intron variant in the oocyte expressed protein (OOEP) gene is associated with twinning rate, prolificacy, and several body measurement traits in Awassi ewes. 225, 107008, *Small Ruminant Research*. <https://doi.org/10.1016/j.smallrumres.2023.107008> WEB OF SCIENCE
 70. Alkammass, A.H., Al-Thuwaini, T.M., **Al-Shuhaib, M.B.S.**, Kazaal, N.A. 2023. Association of Novel C319T Variant of PITX2 Gene 3'UTR Region With Reproductive Performance in Awassi Sheep. *Bioinformatics and biology insights*. <https://doi.org/10.1177/11779322231179018> WEB OF SCIENCE
 71. Lawi, Z.K., Amara, I.B., Elerouri, M., **Al-Shuhaib, M.B.S.** 2023. Two co-inherited SNPs of the telomerase reverse transcriptase (TERT) gene are associated with Iraqi patients with lung cancer. *Journal of Medical Biochemistry*.

- <https://doi.org/10.5937/jomb0-41553> WEB OF SCIENCE
72. Khazaal, N.M., Alghetaa, H.F., **Al-Shuhaib, M.B.S.**, Al-Thuwaini, T.M., Alkammass, A.H. The relationship between OXT gene polymorphisms and reproductive hormones in pregnant and lactating Awassi Ewes. *Molecular Biology Reports*. (2023). <https://doi.org/10.1007/s11033-023-08686-w> WEB OF SCIENCE
 73. Alwan, H.I., Aljubouri, T.R.S., **Al-Shuhaib, M.B.S.** 2023. A Novel Missense SNP in the Fatty Acid-Binding Protein 4 (FABP4) Gene is Associated with Growth Traits in Karakul and Awassi Sheep. *Biochemical Genetics*. <https://doi.org/10.1007/s10528-023-10504-8> WEB OF SCIENCE
 74. **Al-Shuhaib, M.B.S.**, Alam S., Khan, S.A., Hashim, H.O., Al-Shuhaib, J.M. 2023. Masoprocol: a promising candidate for targeting insulin resistance by inhibiting resistin with optimal druglikeness Potentials: an in silico approach. *Journal of Biomolecular Structure and Dynamics*. <https://doi.org/10.1080/07391102.2023.2254842> WEB OF SCIENCE
 75. Musafar, K.N.J., Rava, M. & **Al-Shuhaib, M.B.S.** 2023. Genetic screening for pathogenic variants in type 2 diabetes of the Arab Gulf population: A systematic review and meta-analysis. *International Journal of Diabetes in Developing Countries*. <https://doi.org/10.1007/s13410-023-01265-6> WEB OF SCIENCE
 76. **Al-Shuhaib, M.B.S.**, Al-Shuhaib, J.M.B. Phytochemistry, pharmacology, and medical uses of Oldenlandia (family Rubaceae): a review. *Naunyn-Schmiedeberg's Archive of Pharmacology* (2023). <https://doi.org/10.1007/s00210-023-02756-3> WEB OF SCIENCE
 77. **Al-Shuhaib, M.B.S.**, Hashim, H.O. Mastering DNA chromatogram analysis in Sanger sequencing for reliable clinical analysis. *Journal of Genetic Engineering and Biotechnology*, 21, 115 (2023). <https://doi.org/10.1186/s43141-023-00587-6> WEB OF SCIENCE
 78. **Al-Shuhaib, M.B.S.**, Alam, S., Khan, S. A., Al-Shuhaib, J.M.B., Chen, Y., Alshabrm, F.M. (2023). Hemagglutinin 3 and 8 can be the most efficient influenza subtypes for human host invasion; a comparative in silico approach. *Journal of Biomolecular Structure and Dynamics*. <https://doi.org/10.1080/07391102.2023.2280674> WEB OF SCIENCE
 79. Al-Mousawi, M.R.R., Musafar, K.N.J., Alattabi, A.S., **Al-Shuhaib, M.B.S.** The emergence of a novel SARS-CoV-2 variant with higher efficiency of binding with the human host cell receptors in Iraqi subjects. *Biologia* (2023). <https://doi.org/10.1007/s11756-023-01583-4> WEB OF SCIENCE
 80. Hashim, H. O., **Al-Shuhaib, M.B.S.** Improved DNA Extraction Protocol from Frozen Blood of Patients Who Underwent Systemic Chemotherapy. *Journal of Applied Biotechnology Reports*, 10(4): 1182-1190. (2023). <https://doi.org/10.30491/JABR.2023.394461.1633>
 81. Khazaal, N.M., Alghetaa, H.F., **Al-Shuhaib, M.B.** Hematological parameters as indicators for litter size and pregnancy stage in Awassi ewes. *Iraqi Journal of Veterinary Medicine* 47(1):68-73. <https://doi.org/10.30539/ijvm.v47i1.1504>
 82. **Al-Shuhaib, M.B.S.**, Hashim, H.O. & Al-Shuhaib, J.M.B. D-Glucosamine is a Potential Urease Inhibitor from Middle Eastern Medicinal Plants for Combatting Helicobacter Pylori Infections; a Molecular Docking and Simulation Approach. *Biochemical Genetics* (2024). <https://doi.org/10.1007/s10528-024-10709-5> WEB OF SCIENCE
 83. Hashim, H.O., Al-Shuhaib, J.M.B., Mohammed, M.K., **Al-Shuhaib, M.B.S.** Targeting Monkeypox Virus Methyltransferase: Virtual Screening of Natural Compounds from Middle-Eastern Medicinal Plants. *Molecular Biotechnology* (2024). <https://doi.org/10.1007/s12033-024-01246-y> WEB OF SCIENCE
 84. Bayraktar, M., Koluman, N., **Al-Shuhaib, M.B.S.** 2024. Investigating the Impact of a Novel GHRHR Gene Variant on Growth Traits in Damascus Goats. *Small Ruminant Research* 240; 107366. <https://doi.org/10.1016/j.smallrumres.2024.107366> WEB OF SCIENCE
 85. Ali, D.A., Ali, N.A.L., **Al-Shuhaib, M.B.S.** 2024. A novel intron variant in the prolactin gene associated with eggshell weight and thickness with putative alternative splicing patterns in chickens. *Journal of Genetics* 103:30. <https://doi.org/10.1007/s12041-024-01482-w> WEB OF SCIENCE
 86. **Al-Shuhaib, M.B.S.**, Al-Shuhaib, J.M.B. Assessing Therapeutic Value and Side Effects of Key Botanical Compounds for Optimized Medical Treatments (2024). *Chemistry and Biodiversity*, e202401754. <https://doi.org/10.1002/cbdv.202401754> WEB OF SCIENCE
 87. Abuzahra, M., **Al-Shuhaib, M.B.S.**, Wijayanti, D., Effendi, M.H., Mustofa, I. and Moses, I.B., 2025. A novel p. 127Val> Ile SNP in the MTNR1A gene and its relation to litter size in Thin-tailed Indonesian ewes. *Animal Bioscience*, 38:209-222. <https://doi.org/10.5713/ab.24.0187> WEB OF SCIENCE
 88. Aljubouri, T.R., Al-Khafaji, F.M., **Al-Shuhaib, M.B.S.** 2025. Comparative analysis of sheep growth traits in Karakul, Al-Naimi, and Hamdani breeds. *Assiut Veterinary Medical Journal*, 71; 264-279. <https://doi.org/10.21608/avmj.2024.308004.1325>
 89. **Al-Shuhaib, M.B.S.**, Al-Shuhaib, J.M.B. 2025. Five Key Criteria for Identifying Optimal Therapeutic Targets in Protein-Mediated Diseases. *ChemistrySelect*, 10; e202403409. <https://doi.org/10.1002/slct.202403409> WEB OF SCIENCE
 90. Ali, D.A., Ali, N.A.L., **Al-Shuhaib, M.B.S.** 2025. Comparing Feed Efficiency and Egg Production in Hy-Line W-80 and Iraqi Indigenous Chickens. *Veterinary Research Forum*, 16(4); 195-210. <https://doi.org/10.30466/vrf.2024.2030349.4297> WEB OF SCIENCE
 91. Aljubouri, T.R., **Al-Shuhaib, M.B.S.** 2025. Association between KISS1 gene and growth traits in two Middle Eastern sheep breeds: the Iranian Karakul and the Iraqi Awassi. *Tropical Animal Health and Production*. 57: 187. <https://doi.org/10.1007/s11250-025-04430-7> WEB OF SCIENCE
 92. Jassim, Z. M., Aljubouri, T.R., **Al-Shuhaib, M.B.S.** 2025. Discovery of Novel Insertion SNPs in the ADRB2 Gene Associated with Sheep Growth Performance. *Small Ruminant Research*. 107523. <https://doi.org/10.1016/j.smallrumres.2025.107523> WEB OF SCIENCE
 93. Al-Khafaji, F.M., Al-Jubouri, M.O., Al-Faisal, A.J. **Al-Shuhaib, M.B.S.** 2025. Genetic insights into the endangered yellowfin barbel in Iraqi rivers: a COX1—based approach. *Conservation Genetics Resources*. <https://doi.org/10.1007/s12686-025-01388-4> WEB OF SCIENCE
 94. Jassim, Z. M., Aljubouri, T.R., **Al-Shuhaib, M.B.S.** 2025. Genetic diversity and phylogenetic analysis of ADRB2 gene in

- Awassi and Karakul sheep. *Journal of the Hellenic Veterinary Medical Society*. 76(2), 9171–9184. <https://doi.org/10.12681/jhvms.38602> WEB OF SCIENCE
95. Bayraktar, M.; Göncü, S.; Ergül, A.; Karaman, R.; Özcan, B.D.; Ergül, S.; Oluk, C.A.; Anita, s, Ö.; Bayram, A.; **Al-Shuhaib, M.B.S.** Association Between FABP3 and FABP4 Genes with Changes in Milk Composition and Fatty Acid Profiles in the Native Southern Yellow Cattle Breed. *Veterinary Sciences*. 2025, 12, 893. <https://doi.org/10.3390/vetsci12090893> WEB OF SCIENCE
96. **Al-Shuhaib M.B.S.**, Hashim H.O., Mohammed M.K., Al-Shuhaib J.M. Quercetin-3 Sulfate: A Novel Inhibitor Targeting Helicobacter Pylori Revealed through Molecular Docking and Dynamic Simulations. *Acta Chimica Slovenica*. 2025 Nov 7. <https://doi.org/10.17344/acsi.2025.9336> WEB OF SCIENCE
97. **Al-Shuhaib M.B.S.**, Hashim H.O. An Immunoinformatics Approach for Designing a Novel Multi-Epitope Vaccine Against Junin Virus. *ChemistrySelect*, 2025, 15, 10:e04289. <https://doi.org/10.1002/slct.202504289> WEB OF SCIENCE
98. Mahdi, M.H., Aljubouri, T.R.S., **Al-Shuhaib, M.B.S.** 2026. In Silico Insights Into Growth Hormone Variants: Structural and Functional Implications of Breed-Specific SNPs in Sheep. *Chemistry and Biodiversity*, 23:e03118. <https://doi.org/10.1002/cbdv.202503118> WEB OF SCIENCE
99. Rais, R.A., Al-Qotbi, A.A.A., **Al-Shuhaib, M.B.S.** 2026. The mechanistic basis and functional diversity of rumen-protected methionine technologies in ruminant nutrition. *Small Ruminant Research*, 259, 107759. <https://doi.org/10.1016/j.smallrumres.2026.107759> WEB OF SCIENCE
100. Hasni, F., Daoud, I., Melkemi, N., Kenouche, S., Alorini, T., **Al-Shuhaib, M.B.S.** 2026. Molecular modeling studies of novel breast cancer inhibitors using molecular docking, molecular dynamics, MEP, bioisosteric replacement, and ADME-Tox prediction. *Monatshefte für Chemie*, <https://doi.org/10.1007/s00706-026-03436-7> WEB OF SCIENCE
101. Aljubouri TR, Al-Khafaji FM, **Al-Shuhaib M.B.**, Bayraktar M. 2026. Sheep Breeds of the Middle East: Diversity, Growth Patterns, and Reproductive Performance. *Journal of the Hellenic Veterinary Medical Society* 15;77(2):10283-326. <https://doi.org/10.12681/jhvms.41843> WEB OF SCIENCE
102. **Al-Shuhaib M.B.**, 2026. Protocatechuic acid as the pleiotropic bioactive agent: therapeutic potentials and mechanistic insights. *Phytochemistry Reviews*. <https://doi.org/10.1007/s11101-026-10269-z> WEB OF SCIENCE

Other international publications;

1. Kherachi R, Daoud I, Melkem N, Chelihi A, **Al-Shuhaib MB**, Hamouda S, Meawad SB, El-Arabey AA, Abdalla M. 2026. In silico investigation of 4-(Trifluoromethyl) benzohydrazide derivatives as potential anti-Alzheimer's agents by targeting acetylcholinesterase and butyrylcholinesterase. *In Silico Pharmacology*, 10;14(1):111. <https://link.springer.com/article/10.1007/s40203-026-00605-8>

Reviewer for the following Journals;

- 1) *AFMN Biomedicine*, x1
- 2) *Agriculture*, MDPI, x2 WEB OF SCIENCE
- 3) *Analytical Sciences*, x1 WEB OF SCIENCE
- 4) *Animals*, x4 WEB OF SCIENCE
- 5) *Applied Biochemistry and Biotechnology*, x1 WEB OF SCIENCE
- 6) *Applied Chemical Engineering*, x1
- 7) *Archives of Medical Science*, x5 WEB OF SCIENCE
- 8) *Baghdad Science Journal*, x1
- 9) *Basrah Journal of Agricultural Sciences*, x1
- 10) *Bioinformatics and Biology Insights*, x5 WEB OF SCIENCE
- 11) *Biodiversitas*, *Journal of Biological Diversity*, x3
- 12) *Biochemical Genetics*, x3 WEB OF SCIENCE
- 13) *Bioinformatics and Biology Insights*, x6 WEB OF SCIENCE
- 14) *Chemistry and Biodiversity*, x1 WEB OF SCIENCE
- 15) *ChemistrySelect*, x2 WEB OF SCIENCE
- 16) *Computers in Biology and Medicine*, x23 WEB OF SCIENCE
- 17) *Cogent food & agriculture*, x2 WEB OF SCIENCE
- 18) *Ecological Genetics and Genomics*, x11
- 19) *Egyptian Journal of Forensic Sciences*, x3 WEB OF SCIENCE
- 20) *Endocrinology, Diabetes & Metabolism*, x1 WEB OF SCIENCE
- 21) *European Journal of Clinical and Experimental Medicine*, x2
- 22) *Food Analytical Methods*, 1X WEB OF SCIENCE
- 23) *Frontiers in Genetics*, x1 WEB OF SCIENCE
- 24) *Frontiers in Medicine*, x1 WEB OF SCIENCE
- 25) *Frontiers in Molecular Sciences*, x2 WEB OF SCIENCE
- 26) *Frontiers in Bioinformatics*, x1 WEB OF SCIENCE

- 27) *Frontiers in Veterinary Medicine*, x1 WEB OF SCIENCE
- 28) *Gene*, x6 WEB OF SCIENCE
- 29) *Gene Reports*, x8 WEB OF SCIENCE
- 30) *Genetica*, x1 WEB OF SCIENCE
- 31) *GeroScience*, x2 WEB OF SCIENCE
- 32) *Heliyon*, x3 WEB OF SCIENCE
- 33) *Human Gene*, x15 WEB OF SCIENCE
- 34) *Infection, Genetics, and Evolution*, x1 WEB OF SCIENCE
- 35) *Informatics in Medicine Unlocked*, x1
- 36) *International Journal of Biological Macromolecules*, x4 WEB OF SCIENCE
- 37) *Iraqi Journal of Science*, x2
- 38) *Iranian Journal of Applied Animal Science*, x6 WEB OF SCIENCE
- 39) *Italian Journal of Animal Science*, x1 WEB OF SCIENCE
- 40) *Journal of Animal Science*, x2 WEB OF SCIENCE
- 41) *Journal of Applied Animal Research*, x3 WEB OF SCIENCE
- 42) *Journal of Applied Pharmaceutical Science*, x4
- 43) *Journal of Biomolecular Structure and Dynamics*, x2 WEB OF SCIENCE
- 44) *Journal of Food Measurement and Characterization*, x2 WEB OF SCIENCE
- 45) *Journal of Genetic Engineering and Biotechnology*, x4 WEB OF SCIENCE
- 46) *Journal of integrative medicine*, x2 WEB OF SCIENCE
- 47) *Journal of Oral Biology and Craniofacial Research*, x2
- 48) *Journal of Thermal Biology*, x2 WEB OF SCIENCE
- 49) *Journal of World's Poultry Research*, x4
- 50) *Kuwait Journal of Science*, 1x WEB OF SCIENCE
- 51) *Meta Gene*, x2 WEB OF SCIENCE
- 52) *Mitochondrial DNA Part B: Resources*, x2 WEB OF SCIENCE
- 53) *Microbial Pathogenesis*, x1 WEB OF SCIENCE
- 54) *Molecular Biology Reports*, x2 WEB OF SCIENCE
- 55) *Next Research*, x2
- 56) *Nova Biotechnologica et Chemica*, x2
- 57) *Nucleosides, Nucleotides, and Nucleic Acids*, x3 WEB OF SCIENCE
- 58) *Pakistan Journal of Agricultural Sciences*, x1 WEB OF SCIENCE
- 59) *Pharmacognosy Research*, x1 WEB OF SCIENCE
- 60) *Physiology International*, x2 WEB OF SCIENCE
- 61) *Phytochemistry Reviews*, x3 WEB OF SCIENCE
- 62) *Plant Protection Science*, x1 WEB OF SCIENCE
- 63) *PLOS ONE*, x1 WEB OF SCIENCE
- 64) *Polish Journal of Veterinary Sciences*, x2 WEB OF SCIENCE
- 65) *Saudi Journal of Biological Sciences*, x2 WEB OF SCIENCE
- 66) *Scientia Agricola*, x1 WEB OF SCIENCE
- 67) *Scientific Reports*, x2 WEB OF SCIENCE
- 68) *Small Ruminant Research*, x15 WEB OF SCIENCE
- 69) *Technology in Cancer Research & Treatment*, x1 WEB OF SCIENCE
- 70) *Tropical animal health and production*, x2 WEB OF SCIENCE
- 71) *Veterinary World*, x1, WEB OF SCIENCE

Editorial history

- *Biochemical Genetics*, 2023 – 2024
- *Unig Science*, 2025 – present (<https://www.unigjournal.com/science/about#editorial-board>)

Published Books/Chapters

- Al-Shuhaib, M.B.S. (2024). Classification of Single-Nucleotide Polymorphisms (SNPs): Tips from the Basic Knowledge to the Clinical Outcomes. In: **Interdisciplinary Cancer Research**. Springer, Cham. https://doi.org/10.1007/16833_2024_259

Ranking

- Ranked among top 2% scientists in the world by Stanford University | as the most influential scientists in 2023 (<https://elsevier.digitalcommonsdata.com/datasets/btchxktyw/6>)

Updated Date (Y-M-D)

2026-06-22