

Physiology
Esam Qnais (PhD)
Curriculum Vitae

Personal Information

Name: **Esam Yousef Qnais**

Place of Birth: Amman- Jordan

Nationality: Jordanian

Address: Department of Biology

Faculty of Science

Hashemite University

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Jordan

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Academic Qualifications:

Institution	Mutah University	University of Jordan	Simon Fraser University
Degree	B.Sc (Biology)	M.Sc. (Physiology)	Ph.D (physiology)
Year	2-1994	9-1997	11-2003
Country	Jordan	Jordan	Canada

Title of Master thesis

Study of the physiological effects of *Urtica pilulifera* L. extracts on blood pressure, platelets aggregation, perfused heart and isolated smooth muscles of the rat.

Title of Ph.D thesis

Activity dependent short term plasticity at vomeronasal sensory neuron to mitral cell synapse in accessory olfactory bulb.

Professional experience:

2/10/2019- NOW

Professor, the Hashemite University, Jordan

1-9-2014- 2/10/2019

Associate professor, the Hashemite University, Jordan

1-9-2013- 1-9-2014

Associate professor, the American University of Maddaba, Jordan

2-9-2012- 1-9-2013

Associate professor Inaya Medical College, KSA

2-1-2012- 1-9-2012

Associate professor, the Hashemite University, Jordan

17-11-2003- 30-12-2011

Assistant professor, the Hashemite University, Jordan

6-9-2006- 6-6-2012

Part time professor, University of Jordan, Jordan.

1-1-1999-1-9-2003

Teaching and research assistant, Simon Fraser University, Canada.

1-9-1997-20-12-1998

Teaching and research assistant, the Hashemite University, Jordan

1-9-1994-1-7-1997 Teaching assistant, University of Jordan, Jordan

Teaching Experience:

- Courses taught at Hashemite university and University of Jordan: 2003- present
- **Human physiology**
- **Human anatomy and physiology**
- **Respiratory physiology**
- **Applied physiology**
- **Animal physiology**
- **Neurobiology**
- **Advanced neuroscience**
- **Advance physiology**
- **Special topics (neuroscience)**
- **Histology**
- **General biology 101 and 102**
- **Seminar**
- **Hematology**
- **Microtechnique**
- Mentored multiple graduate students"

1-	Yousra Bseiso	Hashemite University	2006
2-	Khalid Al-Qesi	Hashemite University	2006
-3	Asma Kamel	Hashemite University	2007
-4	Mai Filafel	Hashemite University	2007
-5	Zaid Haiagnh	Hashemite University	2008
-6	Raga Fathalla	Hashemite University	2009
-7	Maan Batayna	Hashemite University	2009
-8	Mutasem Ahmad	Hashemite University	2009
-9	Zaynab Mohamad	University of Jordan	2010
-10	Abeer Harb	University of Jordan	2009
-11	Entesar Alhalak	University of Jordan	2010
-12	Majdi Alnajar	University of Jordan	2010
-13	Kawther Kaed	Hashemite University	2012
-14	Dina Raad	Hashemite University	2012
-15	Ahmad ALATSHAN	Hashemite University	2015
-16	Doaa Bader	Hashemite University	2016
-17	Gadeer Numi	Hashemite University	2017
-18	Rasha Kayed	Hashemite University	2017
-19	Bean Shtewi	Hashemite University	2017
20	Ehsan AlJawarneh	Hashemite University	2018
21	Juhyna Aljalad	Hashemite University	2019
22	Sara tear	Hashemite University	2020
23	Maryam Abu Aresh	Hashemite University	2022
24	Areen Namora	Hashemite University	2022
25	Alaa Dohal	Hashemite University	2023
24	Braa Altamimi	Hashemite University	2025

Participate in designing of the curriculum for department of biology.

Esam Qnais (PhD)

Administrative Experience

- Vice-Dean of the Faculty of Science 1-10-2023-1-10-2024
- Head of Biology Department 1-9-2019- 21-9-2023
- Assistant Dean of the Faculty of Science 1-9-2010-1-9-2012
- Member of the Council of the College of Science as the Biology Department representative 2009-2010, 2016-2017
- Member of Institutional review board of The Hashemite University 2020/2021, 2021/2022, 2023/2024

Research Interests:

- How changes in synaptic efficacy are embedded in the function of neural circuits.
- Immunohistochemistry and distribution of interneurons in olfactory bulb.
- Histochemical and Ultrastructural characteristics of muscle fibers
- Identification of bioactive constituents from plants, antinociceptive, anti-inflammatory and antidiarrheal effects
- Study Antidiabetic effect of compounds isolated from plants and there mechanisms of action
- Biological activity and mechanisms of action of Jordanian medicinal plants

Current Projects/ Record of Funding

- 1- Slow locomotion in Chameleons: Histochemical and Ultrastructural characteristics of muscle fibers isolated from the Iliofibularis muscle of Chamaeleo Chamaeleo. 11000JD
- 2- Study of the physiological activity of the extracts of *Punica granatum* (Pomegranate) Peels on rat. 2350JD
- 3- Pain and the Aging process: Behavioral pharmacological, physiological and biochemical studies in rats. 49500JD
- 4- GABA-Immunopositive neurons in the glomerular layer of the olfactory bulb in the lizard, *Agama stellio stellio*. 2500JD
- 5- The antinociceptive and anti-inflammatory effects of *Salvia officinalis* leaf aqueous and butanolic extracts. 999JD
- 6- Effects of selected chemical ingredients from *Smilax aspera* on rat isolated smooth muscles, inflammation and its potential analgesic effect in mouse. 3400JD
- 7- Antinociceptive and anti-inflammatory Properties of Aqueous Extract and isolated compounds from aerial parts of *Artemisia herba alba* L. 2000 JD
- 8- Periostin in DSS-induced colitis; role of angiotensin II 26800JD

9- Exploring Flavonoids' Therapeutic Efficacy in DSS-Induced Ulcerative Colitis: Insights into Inflammatory Pathways, Immune Modulation, and Microbial Dynamics 28000JD

10- DFT study and catalytic activity 9- Synthesis, X-ray structure, spectroscopic, [Ru(Y)(L)X₂] complexes (Y= PPh₃, AsPh₃, SbPh₃, DMF, Acetonitrile, aniline and L = NN'S thioether azoimine tridentate ligands derivatives). 159000

Committees

- Chairman of safety committee
- Chairman of animal house committee
- Chairman of graduate affairs committee
- Member of sport committee
- Member of research and Graduate Studies (faculty and department)
- Member of Graduate studies (faculty and department)
- Member of Bachelor of biology Degree Plan committee
- Member of Bachelor of biotechnology Degree Plan committee
- Member of Appointments and Promotions Committee (faculty and department)

Societies membership:

Member of Soc. Neurosci. USA

Member of Jordanian Society for Biological Sciences.

Languages

	Reading	Writing	Speaking
Arabic	Excellent	Excellent	Excellent
English	Excellent	Excellent	Excellent

Publications:

- 1- Aljabali, A. A. A., Gammoh, O., **Qnais, E.**, Alqudah, A., Mishra, V., Mishra, Y., & El-Tanani, M. (2025). Dual targeting of TIGIT and VISTA in non-small-cell lung cancer immunotherapy. *EXCLI Journal*, 24, 1100–1142.
<https://doi.org/10.17179/excli2025-8735>
- 2- **Qnais, E.**, Bsieso, Y., Gammoh, O., Aljabali, A. A. A., Alqudah, A., & Alotaibi, B. S. (2025). Mechanistic insights into the cardioprotective effects of Biochanin A against cisplatin-induced toxicity: the role of oxidative stress and the Nrf2 signaling pathway. *Toxin Reviews*, 44(3), 409–419.
<https://doi.org/10.1080/15569543.2025.2528796>
- 3- **Esam Qnais**, Omar Gammoh, Yousra Bsieso, Mohammad Alqudah, Mohammad Wedyan, Sara Altaber, Alaa A.A. Aljabali, Abdelrahim Alqudh, Taher Hatah et. Scopoletin as a cardioprotective agent against cisplatin-induced oxidative stress and inflammation, *Phytomedicine Plus*, 2025

- 4- Alaa A. A. Aljabali, Mohammad A. Obeid, Rasha M. Bashatwah, **Esam Qnais**, Omar Gammoh, Abdelrahim Alqudah, Vijay Mishra, Yachana Mishra, Mohammad Ahmed Khan, Suhel Parvez, Mohamed El-Tanani, Taher Hatahet. Phytochemicals in Cancer Therapy: A Structured Review of Mechanisms, Challenges, and Progress in Personalized Treatment. **Chemistry & Biodiversity**. 2025. doi.org/10.1002/cbdv.202402479
- 5- Bseiso, Y., Gammoh, O., **Qnais, E. et al.** Antinociceptive effect of Arvelexin in male mouse models. *Sci Reports* 15, 34127 (2025).
<https://doi.org/10.1038/s41598-025-03758-2>
- 6-
- 7- **Qnais, E.**, Barakat, M., Alnajjar, R., Alzaghari, L. F., Alqudah, A., Dajani, R., & Hakooz, N. (2025). Awareness, Attitudes, and Practices Regarding OTC Drugs in Circassian and Chechen Communities in Jordan: A Cross-Sectional Study. *Patient Preference and Adherence*, 19, 1661–1672.
<https://doi.org/10.2147/PPA.S525522>
- 8- **Qnais, E. Y.**, Barakat, M., Athamneh, R. Y., Al-Najjar, M. A. A., Alzaghari, L. F., Chellappan, D. K., & Alqudah, A. (2025). Evaluating cytidine, uridine, and gabapentin combinations for pain modulation and p-CREB expression in neuropathic model. *Future Science OA*, 11(1).
<https://doi.org/10.1080/20565623.2025.2483137>
- 9- **Qnais, E.**, Gammoh, O., Bsieso, Y. *et al.* Scopoletin Attenuates Reserpine-Induced Pain-Depression Dyad in Mice via Modulation of Inflammation, Oxidative Stress, and Monoaminergic Pathways. *Neuromol Med* 27, 49 (2025).
<https://doi.org/10.1007/s12017-025-08869-7>
- 10- Gammoh, O., **Qnais, E.**, Aljabali, A.A.A. *et al.* Metabolic resilience: liraglutide's potential in alleviating depressive symptoms. *Mol Biol Rep* 52, 550 (2025). <https://doi.org/10.1007/s11033-025-10641-w>
- 11- Abdelrahim Alqudah, **Esam Qnais**, Omar Gammoh, Yousra Bseiso, Mohammed Wedyan, Sireen Abdul Rahim Shilbayeh, Rawan Abudalo, Muna Oqal, Alaa A.A. Aljabali, Therapeutic efficacy of scopoletin on oxidative stress and cardiac dysfunction in streptozotocin-induced diabetic rats, **The American Journal of the Medical Sciences**, 2025,
<https://doi.org/10.1016/j.amjms.2025.06.010>.
- 12- Mohammed Wedyan, Abdul-salam Juhmani, **Esam Qnais**, Abdelrahim Alqudah, Satriyo Krido Wahono, Andrea Sfriso, Roy Hendroko Setyobudi, The biogeochemistry of dissolved amino acids in the aquatic ecosystems, **Marine Environmental Research**, Volume 210, 2025
- 13- Abdelrahim Alqudah, **Esam Qnais**, Yousra Bseiso, Sireen Abdul Rahim Shilbayeh, Alaa A.A. Aljabali, Omar Gammoh, Activation of the Nrf2 pathway by a novel bipyrazole compound mitigates doxorubicin-induced cardiotoxicity in Wistar albino rats, **European Journal of Pharmacology**, Volume 1000, 2025,
- 14- Abudalo, R., Alqudah, A., Alnajjar, R., Abudalo, R., Abuqamar, A., Oqal, M., & **Qnais, E.** (2025). KRAS/NRAS/BRAF mutational profile and association with clinicopathological characteristics in patients with metastatic colorectal cancer. *Oncology Letters*, 29, 312. <https://doi.org/10.3892/ol.2025.15058>
- 15- Alqudah, A., **Qnais, E.**, Gammoh, O. *et al.* Modulation of inflammatory, oxidative, and apoptotic pathways by cirsimaritin in colitis: A mechanistic

- approach. *ADV TRADIT MED (ADTM)* (2025).
<https://doi.org/10.1007/s13596-025-00832-y>
- 16- Alaa A. A. Aljabali, Mohammad A. Obeid, Rasha M. Bashatwah, **Esam Qnais**, Omar Gammoh, Abdelrahim Alqudah, Vijay Mishra, Yachana Mishra, Mohammad Ahmed Khan, Suhel Parvez, Mohamed El-Tanani, Taher Hatahet Phytochemicals in Cancer Therapy: A Structured Review of Mechanisms, Challenges, and Progress in Personalized Treatment *Chemistry & Biodiversity*. 2025 <https://doi.org/10.1002/cbdv.202402479>
 - 17- Alaa A.A. Aljabali, Rasha M. Bashatwah, Omar Gammoh, **Esam Qnais**, Abdelrahim Alqudah, Vijay Mishra, Yachana Mishra, Mohamed El-Tanani, Harnessing nature's potential: Exploring phytoestrogens in cervical cancer, *Phytomedicine Plus*, Volume 5, Issue 2, 2025, <https://doi.org/10.1016/j.phyplu.2025.100796>.
 - 18- Rabaa Y Athamneh^{1,*}, Lo'ai Alanagreh^{1,2}, **Esam Y. Qnais**³ Hamed Alzoubi⁴, Abdelrahim Alqudah⁵ Rania Algroom⁶, Maisa M. A. AL-QUDAH⁷, Tareq Nayef AlRamadneh¹, Rawan Abudalo Human Papillomavirus 16 (HPV16) in the Middle East and North Africa: Molecular, Epidemiology and Clinical Characterization. *Jordan Journal of Biological Sciences* Volume 18, Number 1, March 2025
 - 19- Omar Gammoh ^{1,2,*}, Abdelrahim Alqudah ³, Mariam Al-Ameri ², Bilal Sayaaheen ^{4,5}, Mervat Alsous ², Deniz Al-Tawalbeh ⁶, Mo'en Alnasraween ⁷, Batoul Al Muhaissen ⁸, Alaa A A Aljabali ⁹, Sireen Abdul Rahim Shilbayeh ¹⁰, Esam Qnais ¹¹ Prevalence and Risk Factors of Mobile Screen Dependence in Arab Women Screened with Psychological Stress: A Cross-Talk with Demographics and Insomnia. *J Clin Med* 2025 Feb 21;14(5):1463. doi: 10.3390/jcm14051463
 - 20- Gammoh, O., **Qnais, E.**, Abu Alshaikh, H., Mansour, M., Al-Hababbeh, S., Weshah, F., Ennab, W., Alotaibi, B. S., & Alqudah, A. (2024). PTSD symptoms among patients with multiple sclerosis in Jordan during October 7th Gaza war outbreak. *The International Journal of Psychiatry in Medicine*, 60(1), 7 <https://doi.org/10.1177/00912174241272680>
 - 21- A Alqudah, **E Qnais**, O Gammoh, Y Bseiso, M Wedyan... Panduratin A mitigates inflammation and oxidative stress in DSS-induced colitis mice model- *Future Science OA*, 2024
 - 22- AE Al-Shudifat, **E Qnais**, Y Bseiso, M Wedyan... Antidepressant potential of β -caryophyllene in maternal separation-induced depression-like in mice: A focus on oxidative stress and nitrite levels - *Phytomedicine Plus*, 2024
 - 23- A Alqudah, **E Qnais**, K Abu-Safieh, O Gammoh... Therapeutic potential of a novel pyrazolyl-pyridine derivative in the treatment of experimental colitis- *Future Medicinal Chemistry*, 2024
 - 24- A Alqudah, **E Qnais**, O Gammoh, Y Bseiso, M Wedyan Protective effects of α -Pinene against carbon tetrachloride-induced cardiac injury in Wistar rats: modulation of antioxidant and inflammatory responses- *Naunyn-Schmiedeberg's Archives of Pharmacology*, 2024
 - 25- O Gammoh, H Durand, A Alqudah, **E Qnais**, Y Ajlouni... Menstrual pain self-medication relates to poor mental health outcomes from Al-Zaatari refugees' camp - *African Journal of Reproductive Health*, 2024
 - 26- A Alqudah, **E Qnais**, Y Bseiso, O Gammoh, M Wedyan... Exploring the

- analgesic potential of isorhamnetin: insights from formalin-induced pain and diabetic neuropathy models.- *European Review for Medical & Pharmacological ...*, **2024**
- 27- Y Bseiso, O Gammoh, M Alqudah, S Altaber, **E Qnais**...Evaluating the Anti-inflammatory Efficacy of a Novel Bipyrazole Derivative in Alleviating Symptoms of Experimental Colitis - **Current molecular pharmacology**, **2024**
 - 28- A Alqudah, **E Qnais**, M Wedyan, A Awali, Y Bseiso, Amino acid profiles: exploring their diagnostic and pathophysiological significance in hypertension, *Molecular Biology Reports*, **2024**
 - 29- A Alqudah, **E Qnais**, O Gammoh, Y Bseiso, M Wedyan. Exploring the therapeutic potential of Anastatica hierochuntica essential oil in DSS-induced colitis, *Inflammopharmacology*, **2024**
 - 30- O Gammoh, **E Qnais**, H Abu Alshaikh, M Mansour... PTSD symptoms among patients with multiple sclerosis in Jordan during October 7th gaza war outbreak *The International Journal of Psychiatry in Medicine*, **2024**
 - 31- A Alqudah, **E Qnais**, O Gammoh, Y Bseiso, M Wedyan . Exploring Scopoletin's Therapeutic Efficacy in DSS-Induced Ulcerative Colitis: Insights into Inflammatory Pathways, Immune Modulation, and Microbial Dynamics - *Inflammation*, **2024**
 - 32- A Alqudah, **E Qnais**, O Gammoh, Y Bseiso, M Wedyan... - Scopoletin mitigates maternal separation-induced anxiety-like and depression-like behaviors in male mice through modulation of the Sirt1/NF- κ B pathway. *Psychopharmacology*, **2024**
 - 33- O Gammoh, H Durand, A Alqudah, **E Qnais**, Y Ajlouni Menstrual pain self-medication relates to poor mental health outcomes from Al-Zaatari refugees' camp. *African Journal of Reproductive Health/La Revue ...*, **2024**
 - 34- Abudalo, O Gammoh, S Altaber, Y Bseiso, **E Qnais** Mitigation of cisplatin-induced cardiotoxicity by Isorhamnetin: Mechanistic insights into oxidative stress, inflammation, and apoptosis modulation. *Toxicology Reports*, **2024**
 - 35- A Alqudah, **E Qnais**, O Gammoh, Y Bseiso, M Wedyan Exploring the therapeutic potential of Anastatica hierochuntica essential oil in DSS-induced colitis. *Inflammopharmacology*, **2024**
 - 36- O Gammoh, RT Akasheh, **E Qnais**, S Al-Taber Unraveling the potential of vitamins C and D as adjuvants in depression treatment with escitalopram in an LPS animal model *Inflammopharmacology*, **2024**
 - 37- OS Gammoh, A Alqudah, **E Qnais**, BS Alotaibi. Factors associated with insomnia and fatigue symptoms during the outbreak of Oct. 7th war on Gaza: A study from Jordan, *Preventive Medicine Reports*, **2024**
 - 38- O Gammoh, A Alqudah, **E Qnais**, AAA Aljabal Are Sleep Aids Associated with the Severity of Attention Deficit Hyperactivity Disorder Symptoms in Adults Screened for Insomnia? A Cross-Sectional Study. *Journal of Clinical*

- 39- A Alqudah, **E Qnais**, M Alqudah, O Gammoh, Isorhamnetin as a potential therapeutic agent for diabetes mellitus through PGK1/AKT activation, *Archives of Physiology and Biochemistry*, **2024**
- 40- A Alqudah, **E Qnais**, O Gammoh, Y Bseiso, M Wedyan. Cirsimaritin Alleviates Dextran Sodium Sulfate-Induced Acute Colitis in Experimental Animals: A Therapeutic Approach for Inflammatory Bowel Disease, *Preventive Nutrition and Food Science*, **2024**
- 41- O Gammoh, A Ibrahim, A Yehya, A Alqudah, **E Qnais**. Exploring the Roles of Vitamins C and D and Etifoxine in Combination with Citalopram in Depression/Anxiety Model: A Focus on ICAM-1, SIRT1 and Nitric Oxide. *International Journal of Molecular Sciences*, **2024**
- 42- A Alqudah, **E Qnais**, SH Sabi, Y Bseiso, O Gammoh, Effects of Coriandrum sativum seeds on memory, anxiety, depression, and sleep quality in students: a randomized controlled study. *Nutrition & Food Science*, **2024**
- 43- R Abudalo, A Alqudah, **E Qnais**, RY Athamneh, M Oqal. Interplay of adiponectin and resistin in type 2 diabetes: Implications for insulin resistance and atherosclerosis. *Pharmacia*, **2024**
- 44- O Gammoh, RT Akasheh, **E Qnais**, S Al-Taber. Unraveling the potential of vitamins C and D as adjuvants in depression treatment with escitalopram in an LPS animal model. *Inflammopharmacology*, **2024**
- 45- Manal H. Al-Bzour¹, Yousra Bsieso², Omar Gammoh³, Mohammed Alqudah⁴, Esam **Y. Qnais**², Mohammed Wedyan², Abdelrahim Alqudah⁵. Exploring the antinociceptive potential of homoeriodictyol in nociception models. *J. Pharm. Pharmacogn. Res*, **2024**
- 46- A Alqudah, **EY Qnais**, O Gammoh, Y Bseiso, M Wedyan - Potential anti-inflammatory activity of the Salvia fruticosa Mill. essential oil *Journal of Pharmacy & PharmacognosyResearch*, **2024**
- 47- **E. Qnais**, A. Alqudah, Y. Bseiso, O. Gammoh, M. Wedyan, B. Alotaibi, Exploring the therapeutic potential of fisetin: a comprehensive study on its anti-nociceptive and anti-inflammatory effects. *Eur Rev Med Pharmacol Sci* **2023**; 27 (21): 10763-10772
- 48- O Gammoh, **EY Qnais**, RY Athamneh, B Al-Jaidi Unraveling the Potential of Isorhamnetin as an Adjuvant in Depression Treatment with Escitalopram. *Current Issues in Molecular Biology*, **2023**
- 49- **EY QNAIS**, A ALQUDAH, M WEDYAN, RY ATHAMNEH the analgesic properties of the flavonoid galangin in experimental animal models of nociception. - *Farmacia*, **2023**

- 50- E Qnais**, A Alqudah, M Wedyan, RY Athamneh. Potential anti-inflammatory activity of the Tamarix aphylla essential oil - *Pharmacia*, **2023**
- 51- Esam Qnais**, Abdelrahim Alqudah, Mohammed Wedyan, Omar Gammoh, Hakam Alkhateeb, Musa Alnoaimi Formononetin suppresses hyperglycaemia through activation of GLUT4-AMPK pathway *Pharmacia* . **2023**
- 52- Yousra Bseiso, Abdelrahim Alqudah, **Esam Qnais**, Mohammed Wedyan, Kayed Abu-Safieh, Omar Gammoh A novel bipyrazole compound exerts

antinociceptive effect using various nociception models. *Pharmacia* ..

2023

- 53- Omar Gammoh, Aseel Ibrahim, **Esam Qnais**, Abdelrahim Alqudah, Sara Altaber, Alaa AA Aljabali, Murtaza M Tambuwala. Vitamins C and D Exhibit Similar Antidepressant Effects to Escitalopram Mediated by NOx and FKBP in a Stress-Induced Mice Model. **Nutrients** **2023**, **15**(12), 2692; <https://doi.org/10.3390/nu15122692>

- 54- Salsabeel H. Sabi, Esam Y. **A. Qnais**, Yara R. Al Tall, Ammar M. Almaaytah, Majed M. Masaadeh. Pharmacogenetics: Histone modification and personalized medicine. *Pharmacia* . **2023**. 70(2). 337-349.
- 55- Alqudah A, **Qnais E**, Wedyan E, AlKhateeb H, Abdalla S, Gammoh O,Alqudah M. Lysionotin exerts antinociceptive effects in various models of nociception induction *Heliyon*, **2023**
- 56- Alqudah, A.; Al-Taani, G.; Handal, D.; Al Sharab, R.; Al Shreideh, R.; Al-Smadi, A.; **Qnais, E.**; Gammoh, O. Factors Associated with Psychotropic Medications Literacy among Community Pharmacists. *Medicina* **2023**, 59 , <https://doi.org/10.3390/medicina59030618>
- 57- OS Gammoh, **E Qnais**, Y Bseiso, K Alrosan, A Alqudah. Evaluation of the antinociceptive effect of valerian and hops combination in experimental animal models: Involvement of the opioid system. *Heliyon*, **2023**
- 58- A Alqudah, R AbuDalo, **E Qnais**, M Wedyan, T Qudah. Potential anti-inflammatory activity of the Anastatica hierochuntica essential oil. *Journal of Essential Oil Research*, **2023**
- 59- A Alqudah, **EY Qnais**, MA Wedyan, S Altaber . New Treatment for Type 2 Diabetes Mellitus Using a Novel Bipyrazole Compound- Cells, **2023**
- 60- A Alqudah, **EY Qnais**, MA Wedyan, S Altaber, Y Bseiso. Isorhamnetin Reduces Glucose Level, Inflammation, and Oxidative Stress in High-Fat Diet/Streptozotocin Diabetic Mice Model. *Molecules*, **2023**
- 61- O Gammoh, A AlQudah, OA Al Rob, A Hmedat, **EY Qnais** . Modulation of salivary ICAM-1 and SIRT1 by disease modifying drugs in undepressed relapsing-remitting multiple sclerosis patients. *Multiple Sclerosis and Related Disorders*, **2022**
- 62- A Alqudah, R AbuDalo, **E Qnais**, M Wedyan, M Oqal The emerging importance of immunophilins in fibrosis development. *Molecular and Cellular Biochemistry*, **2022**
- 63- A Alqudah, **EY Qnais**, MA Wedyan, M Oqal, M Alqudah. Ceratonia siliqua leaves ethanol extracts exert anti-nociceptive and anti-inflammatory effects- *Heliyon*, **2022**
- 64- A Alqudah, M Oqal, A Al-Samdi, **E Qnais**, M Wedyan, MA Gnea Knowledge and practice of community pharmacists towards SGLT2 inhibitors. **2022** F1000Research 11
- 65- M Al-Noaimi, **E Qnais**, FF Awwadi, MI Alwahsh Synthesis, X-ray structure, spectroscopic electrochemistry, anti-nociceptive activity and DFT study of cis-[Ru (EPh3)(L) Cl2] complexes (E= P, as and Sb)(L= thioether-azoimine ... **2021**. *Polyhedron* 202, 115195
- 66- Abdelrahim Alqudah,Ahmad Al-Smadi,Muna Oqal,**Esam Y. Qnais**,Mohammed Wedyan,Majd Abu Gneam,Roaa Alnajjar,Manar

- Alajarmeh, Elaf Yousef, Omar Gammoh. About anxiety levels and anti-anxiety drugs among quarantined undergraduate Jordanian students during COVID-19 pandemic. **2021**. International Journal of Clinical Practice. E 14249.
- 67- Alqudah A, Wedyan M, **Qnais E**, Jawarneh H, McClements L. Plasma Amino Acids Metabolomics' Important in Glucose Management in Type 2 Diabetes. *Front Pharmacol*. **2021**;12:695418. Published 2021 Jul 15. doi:10.3389/fphar.2021.695418
- 68- Wedyan M, Abu-Mhareb L, **Qnais E**, Alqudah A. Evaluation of Health Risk after Nitrate Exposure in Drinking Water in the Al Duliel Area, Jordan. *Pakistan Journal of Biological Sciences : PJBS*. 2021 Jan;24(7):741-747. DOI: 10.3923/pjbs.2021.741.747. PMID: 34486292.
- 69- Abdelrahim Alqudah, Mohammed Wedyan, **Esam Qnais**, Hassan Jawarneh, L ana McClements. Plasma Amino Acids Metabolomics' Profile Important for Glucose Management in Jordanian people with Type 2 Diabetes. 2021. medRxiv. Cold Spring Harbor Laboratory Press
- 70- **E Qnais**, Y Bseiso, M Wedyan, K Abu-Safieh, H Alkhateeb. anti-nociceptive effect of methanol extract of roots of sarcopoterium spinosum in mice. *Pharmacology online*. **2019**. 71-78
- 71- MA Wedyan, **E Qnais**, K Altaif, A Al-Tawaha Characteristics of dissolved organic nitrogen in municipal and biological nitrogen removal wastewater treatment plants in Jordan. *Transylvanian Review of Systematical and Ecological Research*. **2019**. 21 (2), 1-12
- 72- W Talib, M Al-Noaimi, E Alsultan, R Bader, **E Qnais** . A new acetylacetone derivative inhibits breast cancer by apoptosis induction and angiogenesis inhibition *Journal of cancer research and therapeutics*. **2019**15 (5), 1141-1146
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