

# MUSTAFA OĞUZHAN KAYA

## ASSOC. PROF.

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### International Researcher IDs

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Publons / Web Of Science ResearcherID: V-4787-2017

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Yoksis Researcher ID: 28586

## Learning Knowledge

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Doctorate

2010 - 2013

Balikesir University, Institute Of Science, Turkey

## Foreign Languages

English, C1 Advanced

## Dissertations

Doctorate, Yeni bir metodla hyalüronidaz enziminin saflaştırılması ve bazı bileşiklerin bu enzim üzerine etkilerinin araştırılması, Balikesir University, Institute Of Science, 2013

## Published journal articles indexed by SCI, SSCI, and AHCI

- Rational Design, Synthesis, and Computational Investigation of Dihydropyridine [2,3-d] Pyrimidines as Polyphenol Oxidase Inhibitors with Improved Potency**  
KAYA M. O., KERİMAK ÖNER M. N., Demirci T., Musatat A. B., Ozdemir O., Kaya Y., ARSLAN M.  
PROTEIN JOURNAL, vol.43, no.4, pp.869-887, 2024 (SCI-Expanded)
- Rabbit muscle pyruvate kinase activators: Synthesis, molecular docking and theoretical studies of N-substituted sulfonamide derivatives**  
Kaya M. O., Demirci T., Musatat A. B., Özdemir O., Sönmez F., Kaya Y., Arslan M.  
INTERNATIONAL JOURNAL OF BIOLOGICAL MACROMOLECULES, vol.274, no.2, pp.1-13, 2024 (SCI-Expanded)
- Bovine carbonic anhydrase (bCA) inhibitors: Synthesis, molecular docking and theoretical studies of bisoxadiazole-substituted sulfonamide derivatives**  
Eybek A., Kaya M. O., Güleç Ö., Demirci T., Musatat A. B., Özdemir O., Öner M. N., Kaya Y., Arslan M.  
INTERNATIONAL JOURNAL OF BIOLOGICAL MACROMOLECULES, vol.267, pp.131489, 2024 (SCI-Expanded)
- NOVEL TETRAZOLE AND 1,3,4-OXADIAZOLE DERIVATIVES SYNTHESIS, MOLECULAR DOCKING, ADME, POTENTIAL ACTIVATOR FOR RABBIT MUSCLE PYRUVATE KINASE**  
Kaya M. O., Demirci T., Karipçin S., Özdemir O., Kaya Y., Arslan M.  
STUDIA UNIVERSITATIS BABES-BOLYAI CHEMIA, vol.1, no.LXIX, pp.85-105, 2024 (SCI-Expanded)
- Synthesis, activatory effects, molecular docking and ADME studies as rabbit muscle pyruvate kinase activators of ureido phenyl substituted 1,4-dihydropyridine derivatives**  
KAYA M. O., Demirci T., Çalşır Ü., Özdemir O., Kaya Y., Arslan M.  
Research on Chemical Intermediates, vol.50, no.1, pp.437-463, 2024 (SCI-Expanded)

6. **Synthesis, inhibition effects, molecular docking and theoretical studies as Paraoxonase 1 (PON1) inhibitors of novel 1,4-dihydropyridine substituted sulfonamide derivatives**  
KAYA M. O., Demirci T., Ozdemir O., Calisir U., Sonmez F., Arslan M.  
Medicinal Chemistry Research, vol.32, no.5, pp.841-855, 2023 (SCI-Expanded)
7. **Benzenesulfonamide based 1,3,4-oxadiazole derivatives: synthesis, pharmacokinetic property prediction, bovine carbonic anhydrase activity and molecular docking studies**  
Alpınar E., KAYA M. O., Güleç Ö., Demirci T., Kaya Y., Arslan M.  
JOURNAL OF SULFUR CHEMISTRY, vol.45, no.1, pp.65-83, 2023 (SCI-Expanded)
8. **Comparison of Creatine Kinase Myocardial Band (CK-MB) and high sensitive Troponin I (hsTnI) values between athletes and sedentary people**  
Kaya M. O.  
PROGRESS IN NUTRITION, vol.22, no.1, pp.182-188, 2020 (SCI-Expanded)
9. **In vitro effects of 2, 4-Dichlorophenoxy acetic acid dimethylamine salt and enrofloxacin on BTH**  
KAYA M. O.  
INDIAN JOURNAL OF ANIMAL RESEARCH, vol.52, no.7, pp.1043-1047, 2018 (SCI-Expanded)
10. **Oxidant/Antioxidant Status, PON1 and ARES Activities, Trace Element Levels, and Histological Alterations in Sheep with Cystic Echinococcosis**  
Irak K., Celik B. A., Karakoc Z., Celik O. Y., Mert H., Mert N., KAYA M. O.  
IRANIAN JOURNAL OF PARASITOLOGY, vol.13, no.3, pp.448-456, 2018 (SCI-Expanded)
11. **IN VITRO EFFECTS OF NEW GENERATION BISOXADIAZOLE SUBSTITUTED SULFONAMIDE DERIVATIVES ON HUMAN SERUM PARAOXONASE1 (PON1)**  
KAYA M. O., Gulec O., Arslan M.  
FRESENIUS ENVIRONMENTAL BULLETIN, vol.27, pp.3351-3358, 2018 (SCI-Expanded)
12. **In vitro effects of novel type M-V-O derivatives on Xanthine Oxidase**  
KAYA M. O., Gul G. C., Kurtulus F.  
CELLULAR AND MOLECULAR BIOLOGY, vol.63, no.12, pp.25-28, 2017 (SCI-Expanded)
13. **Is there a relation between genetic susceptibility with cancer? A study about paraoxanase (PON1) enzyme activity in breast cancer cases**  
KAYA M. O., Sinan S., Guler O. O., Arslan O.  
JOURNAL OF ENZYME INHIBITION AND MEDICINAL CHEMISTRY, vol.31, no.6, pp.1349-1355, 2016 (SCI-Expanded)
14. **A new affinity method for purification of bovine testicular hyaluronidase enzyme and an investigation of the effects of some compounds on this enzyme**  
KAYA M. O., Arslan O., Guler O. O.  
JOURNAL OF ENZYME INHIBITION AND MEDICINAL CHEMISTRY, vol.30, no.4, pp.524-527, 2015 (SCI-Expanded)
15. **Differential in vitro inhibition studies of some cerium vanadate derivatives on xanthine oxidase**  
KAYA M. O., KAYA M. O., Celik G., Kurtulus F., Arslan O., Guler O. O.  
JOURNAL OF ENZYME INHIBITION AND MEDICINAL CHEMISTRY, vol.30, no.2, pp.286-289, 2015 (SCI-Expanded)
16. **Synthesis and carbonic anhydrase inhibitory properties of tetrazole- and oxadiazole substituted 1,4-dihydropyrimidinone compounds**  
Celik F., Arslan M., KAYA M. O., Yavuz E., Gencer N., Arslan O.  
ARTIFICIAL CELLS NANOMEDICINE AND BIOTECHNOLOGY, vol.42, no.1, pp.58-62, 2014 (SCI-Expanded)
17. **IN VITRO INHIBITION OF PURIFIED HUMAN CARBONIC ANHYDRASE I AND II BY NOVEL FLUORENE DERIVATIVES**  
Demirhan H., Arslan M., KAYA M. O., KAYA M. O., Gencer N., Arslan O.  
MACEDONIAN JOURNAL OF CHEMISTRY AND CHEMICAL ENGINEERING, vol.33, no.2, 2014 (SCI-Expanded)

## Articles Published in Other Journals

1. **Synthesis and Evaluation of 1,4-Dihydropyridine-Based Urea Derivatives as Polyphenol Oxidase**

## Inhibitors

Kaya M. O., Demirci T., Taş H. İ., Karayağız Ş., Musat A. B., Kaya Y., Kerimak Öner M. N., Özdemir O., Arslan M. Türkiye Tarımsal Araştırmalar Dergisi, vol.11, no.2, pp.235-242, 2024 (Peer-Reviewed Journal)

2. **The Effect of Rheum ribes Extract Origin of Elazig Province on Ventilator-Associated Pneumonia and Antioxidant Capacity**  
OZDEMİR O., TOY N., KAYA M. O.  
Gazi Üniversitesi Fen Bilimleri Dergisi Part C: Tasarım ve Teknoloji, vol.12, no.1, pp.25-39, 2024 (Peer-Reviewed Journal)
3. **Chloroform-Methanol Extraction Antimicrobial Potential of Rheum Ribes Originating from Elazig/Arıcak Province**  
Özdemir O., Kaya M. O., Gök M., Yılmaz N., Tuzcu Z.  
İğdır Üniversitesi Fen Bilimleri Enstitüsü Dergisi, vol.13, no.2, pp.830-838, 2023 (Peer-Reviewed Journal)
4. **Novel viewpoint by headspace/GC-MS: Volatile Oil of Lavandula angustifolia origin of Denizli Province**  
ÖZDEMİR O., YILMAZ N., KAYA M. O., GÖK M.  
Türkiye Tarımsal Araştırmalar Dergisi, 2022 (Peer-Reviewed Journal)
5. **Purification of Xanthine Oxidase and Investigation of Its Immobilization with Glutaraldehyde**  
KAYA Y., İŞİK S., BEYAZTAŞ UZUNOĞLU S., KAYA M. O.  
Türkiye Tarımsal Araştırmalar Dergisi, vol.9, no.3, pp.314-322, 2022 (Peer-Reviewed Journal)
6. **The Prevalence of Neoplasm Diseases and Investigation of Some Biochemical Serum Parameters**  
Karagecili H., Yerlikaya E., Kaya M. O., ,  
Hittite Journal of Science and Engineering, vol.8, no.2, pp.189-195, 2021 (Peer-Reviewed Journal)
7. **Synthesis and Biological Evaluation of Novel Dihydro [2,3D] Pyridine Substituted Enaminosulfonamide Compounds as Potent Human Erythrocyte Carbonic Anhydrase II (hCAII)**  
DEMİRÇİ T., ÖZDEMİR O., KAYA M. O., ARSLAN M.  
Sakarya University Journal of Science, vol.25, no.1, pp.164-175, 2021 (Peer-Reviewed Journal)
8. **Comparison of Biochemical Parameters of Prevalent Hemoglobinopathies with Healthy Individuals**  
YERLİKAYA E., KARAGEÇİLİ H., KAYA M. O.  
Medicine Science International Medical Journal, vol.9, no.3, pp.708-713, 2020 (Peer-Reviewed Journal)
9. **Romanov Koyunları Amniyon Sıvısı İle Hyalüronidaz Aktivitesinin Araştırılması**  
KAYA M. O., İRAK K., MERSİN S., YERLİKAYA E., KARAGEÇİLİ H.  
Türkiye Tarımsal Araştırmalar Dergisi, vol.5, no.1, pp.58-64, 2018 (Peer-Reviewed Journal)
10. **Carbonic Anyhdrase Enzyme From The Siirt Mohair Goat Liver : Purification, Characterization and Assessment of Enzyme Kinetics Against Metal Toxicity**  
YERLİKAYA E., KARAGEÇİLİ H., DEMİRDAĞ R., KAYA M. O.  
Hacettepe Journal of Biology and Chemistry, vol.45, no.4, pp.629-634, 2017 (Peer-Reviewed Journal)
11. **Out-of-mind Inhibitors Of Human Serum Paraoxonase 1 (PON1): An In Vitro study**  
KAYA M. O.  
Middle East Journal of Science, vol.3, no.1, pp.59-77, 2017 (Peer-Reviewed Journal)
12. **Bazı yem ve gübre sanayi kimyasallarının hyalüronidaz üzerine in vitro etkileri**  
KAYA M. O., YERLİKAYA E., ÖZYAZICI M. A., İRAK K.  
ANADOLU TARIM BİLİMLERİ DERGİSİ, vol.31, no.3, pp.399-407, 2016 (Peer-Reviewed Journal)
13. **Siirt Tiftik Keçisi Böbrek Dokusundan Karbonik Anhidraz Enziminin Saflaştırılması Karakterizasyonu ve Bazı Biyokimyasal Özelliklerinin Araştırılması**  
YERLİKAYA E., KARAGEÇİLİ H., DEMİRDAĞ R., KAYA M. O.  
Erzincan University Journal of Science and Technology, vol.1, no.9, pp.1-9, 2016 (Peer-Reviewed Journal)

## Refereed Congress / Symposium Publications in Proceedings

1. **Impact of Lactic Acid Bacteria on Mold-Produced Mycotoxins in Food Industry Applications**

- Yılmaz N., Coşkun Dağgeçen E., Kaya M. O.  
4th International Conference on Research of Agricultural and Food Technologies (I-CRAFT 2024), Toskent, Uzbekistan, 11 - 13 September 2024, pp.410-418
2. **Medicinal and Aromatic Plant Vinegars: Therapeutic Properties and Food Industry Applications**  
Yılmaz N., Özdemir O., Kaya M. O., Bekiroğlu H. K.  
4th International Conference on Research of Agricultural and Food Technologies (I-CRAFT 2024), Toskent, Uzbekistan, 11 - 13 September 2024, pp.426-433
3. **Production of Carbon Quantum Dots from Hazelnut Shells by Microwave Method with Formic Acid and Acetic Acid and Investigation of Polyphenol Oxidase (PPO) Enzyme Activity**  
Tekin B., Koç D., Elibol E., Demirci T., Kerimak Öner M. N., Kaya M. O.  
4.Uluslararası Mühendislik ve Doğa Bilimleri Çalışmaları Kongresi, Ankara, Turkey, 24 - 25 May 2024, pp.253-265
4. **Determination of bioactive compounds from pine rosin in Mediterranean location: Kaburgediği, Mavisilifke, Karabucak**  
Özdemir O., Yılmaz N., Kaya M. O., Gök M.  
5th International Eurasian Conference on Biological and Chemical Sciences (EurasianBioChem 2022), Ankara, Turkey, 23 - 25 November 2022, pp.1-5
5. **Possible effects of medicine plant extracts on growth of probiotic microorganisms: *Lb. reuteri*, *B. clausii***  
Yılmaz N., Özdemir O., Kaya M. O.  
5th International Eurasian Conference on Biological and Chemical Sciences (EurasianBioChem 2022), Ankara, Turkey, 23 - 25 November 2022, pp.1-5
6. **Lavandula angustifolia'nın bazı antimikrobiyal, antioksidan ve fitokimyasal özelliklerinin araştırılması**  
ÖZDEMİR O., YILMAZ N., GÖK M., KAYA M. O.  
3rd International Eurasian Conference on Biological and Chemical Sciences (EurasianBioChem 2020), Turkey, 19 March 2020, vol.1
7. **Yarı Kurak İklim Koşullarında Yetiştirilen Bazı Buğdaygil Çim Türlerinin Makro ve Mikro Elementler Yönünden Beslenme Durumları**  
ÖZYAZICI M. A., TURAN N., AÇIKBAŞ S., KAYA M. O.  
1. Uluslararası Çayır-Mera ve Yem Bitkileri Kongresi, Adana, Turkey, 22 - 23 February 2020, pp.3-4
8. **THE EFFECTS OF A NOVEL DIHYDRO[3,2-D] PYRIDINE SERIES ON HUMAN ERYTHROCYTE CARBONIC ANHYDRASE ENZYME I (HCAI)**  
DEMİRCİ T., KAYA M. O., ÖZDEMİR O., ARSLAN M.  
INTERNATIONAL ASIAN CONGRESS ON CONTEMPORARY SCIENCES, 15 - 24 April 2019, pp.204-213
9. **ABNORMAL HEMOGLOBINS AND INVESTIGATION OF THE INCIDENCE IN SIIRT/TURKEY**  
YERLİKAYA E., KARAGEÇİLİ H., KAYA M. O.  
EJONS 4.International Congress on Mathematic, Engineering and Natural Sciences, Kiev, Ukraine, 11 - 13 August 2018, pp.55-57
10. **Examination of Biochemical Serum Values of Breast and Prostate Cancer Patients in Terms of Incidence And Malignancy.**  
KARAGEÇİLİ H., YERLİKAYA E., KAYA M. O.  
EJONS 4.International Congress on Mathematic, Engineering and Natural Sciences, Kiev, Ukraine, 11 - 13 August 2018, pp.58-62
11. **Evaluation Malignant Cancers: Lung and Bone Marrow Cancers incidence, Survival and Patients Serum Parameters**  
KARAGEÇİLİ H., YERLİKAYA E., KAYA M. O.  
3rd International Conference on Advances In Natural Applied Science Chemistry (ICANAS'18), Antalya, Turkey, 9 - 12 May 2018, pp.40-41
12. **Comparison of Biochemical Parameters of Beta Thalassemia Intermedia and Beta Thalassemia Minor Patients with Healty Individuals.**  
YERLİKAYA E., KARAGEÇİLİ H., KAYA M. O.

3rd International Conference on Advances In Natural Applied Science Chemistry (ICANAS'18), Antalya, Turkey, 9 - 12 May 2018, pp.38-39

13. **Determination of The Skin Cancers Incidence and Evaluation of Patients Serum Parameters.**  
KARAGEÇİLİ H., YERLİKAYA E., KAYA M. O.  
EJONS International Congress on Mathematic, Engineering and Natural Sciences - III, Mardin, Turkey, 21 April - 22 May 2018, pp.151
14. **EVALUATION OF SOME BIOCHEMICAL PARAMETERS OF SICKLE CELL ANEMIA PATIENTS WITH HEALTHY INDIVIDUALS**  
YERLİKAYA E., KARAGEÇİLİ H., KAYA M. O.  
EJONS International Congress on Mathematic, Engineering and Natural Sciences - III, Mardin, Turkey, 21 - 22 April 2018, pp.152
15. **ROMANOV IRKI KOYUNLARIN AMNİYOTİK SIVISIYLA HYALÜRONİDAZ AKTİVİTESİNİN ARAŞTIRILMASI**  
KAYA M. O., İRAK K., YERLİKAYA E., KARAGEÇİLİ H., MERSİN S.  
17. Kromatografi Kongresi (Kromatografi 2017), Çorum, Turkey, 20 - 22 September 2017
16. **An in vitro inhibition study for Bovine Testicular Hyaluronidase with 2,4-Dichlorophenoxy acetic acid dimethyl amine salt and Enrofloxacin.**  
KAYA M. O.  
III INTERNATIONAL CONFERENCE ON ENGINEERING AND NATURAL SCIENCES (ICENS), Budapest, Hungary, 3 - 07 May 2017
17. **SOME OFTEN USED CHEMICALS IN VITRO EFFECTS ON PON1 ASSOCIATED WITH BIOTECHNOLOGY**  
KAYA M. O.  
International Engineering, Science and Education Conference (INESEC), Diyarbakır, Turkey, 1 - 03 December 2016
18. **An examination of hyaluronidase enzyme activity in four different sheep breeds**  
Arslan M., Sackes Z., Kaya M. O.  
41st FEBS Congress, Aydın, Turkey, 3 - 08 September 2016, vol.283, pp.127-427
19. **BİYOTEKNOLOJİK ÖNEME SAHİP BAZI BİLEŞİKLERİN SIĞIR TESTİS HYALÜRONİDAZI ÜZERİNE IN VITRO ETKİLERİNİN ARAŞTIRILMASI**  
KAYA M. O., YERLİKAYA E., ÖZYAZICI M. A., İRAK K.  
8. Ulusal Veteriner Biyokimya ve Klinik Biyokimya Kongresi, Bursa, Turkey, 22 - 24 September 2016
20. **BAZI BİYOTEKNOLOJİK KİMYASALLARIN PON1 ENZİMİ ÜZERİNE IN VITRO ETKİLERİNİN ARAŞTIRILMASI**  
KAYA M. O.  
10. Ulusal Afinite Teknikleri Kongresi, Ayvalık/Balıkesir, Turkey, 26 - 28 May 2016
21. **SİİRT TİFTİK KEÇİSİ BÖBREK DOKUSUNDAN KARBONİK ANHİDRAZ ENZİMİNİN SAFLAŞTIRILMASI KARAKTERİZASYONU VE BAZI BİYOKİMYASAL ÖZELLİKLERİNİN ARAŞTIRILMASI**  
YERLİKAYA E., KARAGEÇİLİ H., DEMİRDAĞ R., KAYA M. O.  
27. Ulusal Kimya Kongresi, Çanakkale, Turkey, 23 - 28 August 2015
22. **KARBONİK ANHİDRAZ ENZİMİNİN SİİRT TİFTİK KEÇİSİ KARACİĞER DOKUSUNDAN SAFLAŞTIRILMASI KARAKTERİZASYONU VE İNHİBİSYON ÇALIŞMALARI**  
YERLİKAYA E., KARAGEÇİLİ H., DEMİRDAĞ R., KAYA M. O.  
27. Ulusal Kimya Kongresi, Çanakkale, Turkey, 23 - 28 August 2015
23. **A new affinity method for purification of bovine testicular hyaluronidase enzyme and an investigation of the effects of some compounds on this enzyme**  
TERZİ E., KAYA M. O., ARSLAN O., ÖZENSOY GÜLER Ö.  
40th FEBS Congress, The Biochemical Basis of Life, Berlin, Germany, 4 - 09 July 2015, vol.282, pp.145
24. **Differential in vitro inhibition studies of some cerium vanadate derivatives on Xanthine oxidase**  
ÖZ BEDİR B. E., TERZİ E., KAYA M. O., KAYA Y., ÇELİK GÜL G., KURTULUŞ F., ARSLAN O., ÖZENSOY GÜLER Ö.  
FEBS JOURNAL-FEBS EMBO 2014 Conference, Paris, France, 30 August - 04 September 2014, vol.281, pp.65-784
25. **Carbonic Anhydrase I and II inhibition with levonorgestrel ethinyl estradiol for birth control pill Microgynon**

- KAYA M. O., ARSLAN O.  
8th Aegean Analytical Chemistry Days, İzmir, Turkey, 16 - 20 September 2012
26. **Some of apigenin derivatives impact on polyphenol oxidase enzyme**  
ERGÜN A., KAYA M. O., ÇELİK F., KÜÇÜKİSLAMOĞLU M., ARSLAN O.  
8th Aegean Analytical Chemistry Days, İzmir, Turkey, 16 - 20 September 2012
27. **Xanthine oxidase inhibition with colchicine for gout disease drug Colchicum Dispert**  
KAYA M. O., KAYA Y., ARSLAN O.  
3rd Pak-Turk Conference on Chemical sciences, Bursa, Turkey, 13 - 15 September 2012
28. **Some of carbazol substituted chalcone urea derivatives impact on polyphenol oxidase enzyme**  
ERGÜN A., KAYA M. O., ARLETA RİFATİ N., ARSLAN O.  
3rd Pak-Turk Conference on Chemical sciences, Bursa, Turkey, 13 - 15 September 2012
29. **Meme kanserli olgularda paraoksonaz PON1 polimorfizminin belirlenmesi**  
KAYA M. O., SİNAN S., ARSLAN O.  
6.Ulusal Afinite Teknikleri Kongresi, Aksaray, Turkey, 26 - 29 May 2010
30. **Okso tiyo crown eterlerin sentezi ve paraoksonaz enzimine karşı ilgisinin araştırılması**  
ÇİÇEK B., ERGÜN A., KAYA M. O., ÇAKIR Ü., ARSLAN O.  
V.Ulusal Afinite Teknikleri Kongresi, Ayvalık-Balıkesir, Turkey, 20 - 24 May 2009
31. **Ch2 proteininin saflaştırılması ve kristalizasyon basamağı**  
KAYA M. O., Bochtler M.  
V.Ulusal Afinite Teknikleri Kongresi, Ayvalık/BALIKESİR, Turkey, 20 - 24 May 2009

## Metrics

Publication: 61  
Citation (WoS): 44  
Citation (Scopus): 46  
H-Index (WoS): 4  
H-Index (Scopus): 5

## Research Areas

Biochemistry

## Non Academic Experience

Oxford University  
Cardiff University