

## **Prof. Zerrin Heren**

### **Personal Information**

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### **Education Information**

Doctorate, Ondokuz Mayıs University, Fen Bilimleri Enstitüsü, Kimya (Dr), Turkey 1990 - 1996

Postgraduate, Ondokuz Mayıs University, Fen Bilimleri Enstitüsü, Kimya (Yl) (Tezli), Turkey 1987 - 1989

Undergraduate, İstanbul University-Cerrahpaşa, Mühendislik Fakültesi, Kimya Mühendisliği Bölümü, Turkey 1978 - 1985

### **Foreign Languages**

English, B2 Upper Intermediate

### **Dissertations**

Doctorate, Katkılı çimento pastalarının gözenek dağılımı ve dayanım ilişkileri, Ondokuz Mayıs University, Fen Bilimleri Enstitüsü, Kimya (Dr), 1996

### **Academic Titles / Tasks**

Professor, Ondokuz Mayıs University, Fen-Edebiyat Fakültesi, Kimya Bölümü, 2013 - Continues

Professor, Ondokuz Mayıs University, Fen-Edebiyat Fakültesi, Kimya Bölümü, 2013 - Continues

Associate Professor, Ondokuz Mayıs University, Fen-Edebiyat Fakültesi, Kimya Bölümü, 2007 - 2013

Research Assistant, Ondokuz Mayıs University, Fen-Edebiyat Fakültesi, Kimya Bölümü, 1985 - 1998

### **Courses**

ENDÜSTRİYEL KİMYA II, Undergraduate, 2013 - 2014

IR SPEKTROSKOPİSİ, Doctorate, 2013 - 2014

ANORGANİK KİMYA LAB., Undergraduate, 2013 - 2014

BİLİM TARİHİ, Undergraduate, 2012 - 2013

ANORGANİK KİMYA II, Undergraduate, 2012 - 2013

ANORGANİK KİMYA I, Undergraduate, 2012 - 2013

ENDÜSTRİYEL KİMYA I, Undergraduate, 2012 - 2013

KOROZYON KİMYASI, Undergraduate, 2011 - 2012

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

- I. Synthesis, characterization, crystal structure, Hirshfeld surface analysis and spectroscopic

- properties of bis(5-aminoisophthalato) bispicolinecopper (II)**  
Erdogmus G., DEMİRCİOĞLU Z., HEREN Z., Topcu Y., Buyukgungor O.  
JOURNAL OF MOLECULAR STRUCTURE, vol.1206, 2020 (SCI-Expanded)
- II. **Diaquabis(5-methoxyindole-2-carboxylato)bis(3-picoline)nickel(II) Complex: Synthesis, Characterization, XRD, TGA, DFT and HSA**  
Cebe D., HEREN Z., DEMİRCİOĞLU Z., Buyukgungor O.  
MOLECULAR CRYSTALS AND LIQUID CRYSTALS, vol.667, no.1, pp.112-125, 2018 (SCI-Expanded)
- III. **One-pot New Barbituric Acid Derivatives Derived from the Reaction of Barbituric Acids with BrCN and Ketones**  
Hosseini Y., Rastgar S., HEREN Z., Buyukgungor O., Pesyan N. N.  
JOURNAL OF THE CHINESE CHEMICAL SOCIETY, vol.58, no.3, pp.309-318, 2011 (SCI-Expanded)
- IV. **Crystal structures, thermal, spectroscopic properties and DFT/TD-DFT based investigation of [M(bba)(2)(phen)] (M = Cu and Zn, bba=2-benzoylbenzoato, phen=1,10-phenanthroline)**  
ÇAĞLAR S., Demir S., HEREN Z., Buyukgungor O.  
POLYHEDRON, vol.30, no.8, pp.1389-1395, 2011 (SCI-Expanded)
- V. **Synthesis, crystal structures, thermal, and spectroscopic properties of four new metal(II) (M = Co, Ni, Cu, Hg) complexes of 2-benzoylbenzoate with 3-picoline**  
Çağlar S., Heren Z., Buyukgungor O.  
JOURNAL OF COORDINATION CHEMISTRY, vol.64, no.15, pp.2706-2717, 2011 (SCI-Expanded)
- VI. **Synthesis, Characterization, and Crystal Structures of a Novel [Zn-3(bba)(6)(3-pic)(2)] Complex (bba=2-Benzoylbenzoat, 3-pic=3-Picoline)**  
ÇAĞLAR S., HEREN Z., Yildirim M. H.  
SYNTHESIS AND REACTIVITY IN INORGANIC METAL-ORGANIC AND NANO-METAL CHEMISTRY, vol.41, no.8, pp.1022-1027, 2011 (SCI-Expanded)
- VII. **Synthesis, thermal and spectroscopic properties, and crystal structures of [Co(bba)(2)(H<sub>2</sub>O)(phen)] and [Ni(bba)(2)(H<sub>2</sub>O)(butOH)(phen)] (bba=2-benzoylbenzoate, phen=1,10-phenanthroline, butOH = butanol)**  
ÇAĞLAR S., HEREN Z., Buyukgungor O.  
JOURNAL OF COORDINATION CHEMISTRY, vol.64, no.7, pp.1289-1298, 2011 (SCI-Expanded)
- VIII. **trans-Bis(2-benzoylbenzoato-kappa O-1)bis(ethanol-kappa O)bis(1H-imidazole-kappa N-3)nickel(II)**  
HEREN Z., Pasaoglu H., Yildirim M. H., Hira D.  
ACTA CRYSTALLOGRAPHICA SECTION E-CRYSTALLOGRAPHIC COMMUNICATIONS, vol.65, 2009 (SCI-Expanded)
- IX. **Bis(benzimidazole-kappa N-3)bis(2-benzoylbenzoato-kappa O)copper(II)**  
Yildirim M. H., HEREN Z., Pasaoglu H., Hira D., Buyukgungor O.  
ACTA CRYSTALLOGRAPHICA SECTION E-CRYSTALLOGRAPHIC COMMUNICATIONS, vol.65, 2009 (SCI-Expanded)
- X. **Synthesis, Spectrothermal and Structural Characterization of Saccharinatobis(tris-hydroxymethylaminomethane)zinc(II) saccharinate Complex, [Zn(sac)(tham)(2)](sac)**  
Pasaoglu H., HEREN Z., Kastas G., Akdag K.  
ACTA CRYSTALLOGRAPHICA A-FOUNDATION AND ADVANCES, vol.65, 2009 (SCI-Expanded)
- XI. **Synthesis, Spectroscopic and Structural Characterization Of Bis(Benzimidazole-kappa N-3) Bis(2-Benzoylbenzoato-kappa O)Copper(II)**  
HEREN Z., Pasaoglu H., Yildirim M. H.  
ACTA CRYSTALLOGRAPHICA A-FOUNDATION AND ADVANCES, vol.65, 2009 (SCI-Expanded)
- XII. **cis-bis(butylamine-kappa N)bis[sulfa-diazine(1-) -kappa N-2,N ']copper(II) pentahydrate**  
Pasaoglu H., Kastas G., HEREN Z., Buyukgungor O.  
ACTA CRYSTALLOGRAPHICA SECTION E-STRUCTURE REPORTS ONLINE, vol.64, 2008 (SCI-Expanded)
- XIII. **Synthesis, spectrothermal and structural characterization of saccharinatobis(tris-hydroxymethylaminomethane)zinc(II)saccharinate complex, [Zn(sac)(tham)2](sac)**  
HEREN Z., Paşaoğlu H., Kaşaş G., Akdağ K.  
Zeitschrift fur Anorganische und Allgemeine Chemie, vol.634, no.11, pp.1933-1936, 2008 (SCI-Expanded)
- XIV. **An EPR study of Cu(2+) ions in [Zn(picol)(2)(H<sub>2</sub>O)(2)]center dot 2H<sub>2</sub>O single crystals**

- Karabulut B., Duezguen F., Keser C., Heren Z.  
PHYSICA B-CONDENSED MATTER, vol.396, no.1-2, pp.8-11, 2007 (SCI-Expanded)
- XV. **Synthesis, spectral and thermal studies, and crystal structure of cis-bis(4-methylimidazole)bis(picolinato)copper(II) [Cu(pic)(2)(4-MeIm)(2)]**  
Heren Z., Keser C., Ersanli C. C., YEŞİLEL O. Z., Ocak N.  
ZEITSCHRIFT FUR NATURFORSCHUNG SECTION B-A JOURNAL OF CHEMICAL SCIENCES, vol.61, no.10, pp.1217-1221, 2006 (SCI-Expanded)
- XVI. **Synthesis, spectral and thermal studies, and crystal structure of cis-bis(imidazole)bis(picolinato)copper(II) dihydrate [Cu(pic)(2)(im)(2)] center dot 2H(2)O**  
Heren Z., Keser C., Ersanli C. C., YEŞİLEL O. Z., Buyukgungor O.  
ZEITSCHRIFT FUR NATURFORSCHUNG SECTION B-A JOURNAL OF CHEMICAL SCIENCES, vol.61, no.9, pp.1072-1078, 2006 (SCI-Expanded)
- XVII. **Synthesis, spectroscopic and structural investigation of ZnI2(nicotinamide)(2), ZnI2(isonicotinamide)(2) and [Zn(H2O)(2)(picolinamide)(2)]I-2**  
Pasaoglu H., Guven S., Heren Z., Buyukgungor O.  
JOURNAL OF MOLECULAR STRUCTURE, vol.794, no.1-3, pp.270-276, 2006 (SCI-Expanded)
- XVIII. **Butylammonium sulfadiazinate monohydrate**  
Heren Z., Pasaoglu H., Kastas G.  
ACTA CRYSTALLOGRAPHICA SECTION E-CRYSTALLOGRAPHIC COMMUNICATIONS, vol.62, 2006 (SCI-Expanded)
- XIX. **Synthesis, spectral and thermal properties, and crystal structure of bis(ethylenediamine)(aqua)copper(II) (bis)syringate ethylenediamine dihydrate [Cu(en)(2)(H2O)](sy)(2)(en)(H2O)(2)**  
Heren Z., Pasaoglu H., Kastas G., Vurucu L., Buyukgungor O.  
ZEITSCHRIFT FUR NATURFORSCHUNG SECTION B-A JOURNAL OF CHEMICAL SCIENCES, vol.61, no.3, pp.287-291, 2006 (SCI-Expanded)
- XX. **The novel polymeric complex of manganese(II) with picolinic acid, [Mn(pic)(2)](n), a new coordination mode for picolinic acid**  
Heren Z., Pasaoglu H., Kastas G., Keser C., YEŞİLEL O. Z., Buyukgungor O.  
ZEITSCHRIFT FUR ANORGANISCHE UND ALLGEMEINE CHEMIE, vol.632, no.8-9, pp.1578-1581, 2006 (SCI-Expanded)
- XXI. **Synthesis, spectral and thermal studies, and crystal structure of cis-bis(4-methylimidazole)bis(picolinato)copper(II) [Cu(pic)2(4-MeIm) 2]**  
HEREN Z., Keser C., Ersanli C. C., YEŞİLEL O. Z., Ocak N.  
Zeitschrift fur Naturforschung - Section B Journal of Chemical Sciences, vol.61, no.10, pp.1217-1221, 2006 (SCI-Expanded)
- XXII. **Synthesis, spectral and thermal studies, and crystal structure of cis-bis(imidazole)bis(picolinato)copper(II) dihydrate [Cu(pic) 2(im)2]·2H2O**  
HEREN Z., Keser C., Ersanli C. C., YEŞİLEL O. Z., Büyükgüngör O.  
Zeitschrift fur Naturforschung - Section B Journal of Chemical Sciences, vol.61, no.9, pp.1072-1078, 2006 (SCI-Expanded)
- XXIII. **Synthesis, spectral and thermal properties, and crystal structure of bis(ethylenediamine)(aqua)copper(II) (bis)syringate ethylenediamine dihydrate[Cu(en)2(H2O)](sy)2(en)(H 2O)2**  
HEREN Z., Paşaoğlu H., Kaşaş G., Vurucu L., Büyükgüngör O.  
Zeitschrift fur Naturforschung - Section B Journal of Chemical Sciences, vol.61, no.3, pp.287-291, 2006 (SCI-Expanded)
- XXIV. **Analysis of triethanolamine in trass cement pastes by voltammetric methods**  
Menek N., HEREN Z.  
Cement and Concrete Research, vol.30, no.10, pp.1615-1617, 2000 (SCI-Expanded)
- XXV. **Analysis of triethanolamine in white cement pastes by voltammetric methods**  
Menek N., HEREN Z.  
Cement and Concrete Research, vol.29, no.5, pp.777-779, 1999 (SCI-Expanded)
- XXVI. **Thermal behaviour of some azo dyes containing sterically hindered and water-soluble groups**

- Kocaokutgen H., HEREN Z.  
Turkish Journal of Chemistry, vol.22, no.4, pp.403-408, 1998 (SCI-Expanded)
- XXVII. **The influence of ethanolamines on the surface properties of Portland cement pastes**  
HEREN Z., Ölmez H.  
Cement and Concrete Research, vol.27, no.6, pp.805-809, 1997 (SCI-Expanded)

## Articles Published in Other Journals

- I. **The influence of ethanolamines on the hydration and mechanical properties of Portland cement**  
HEREN Z., Ölmez H.  
Cement and Concrete Research, vol.26, no.5, pp.701-705, 1996 (Scopus)

## Refereed Congress / Symposium Publications in Proceedings

- I. **Synthesis, Crystal Structure, Thermal and Spectroscopic Properties of New Mn (II) Complex of 5-aminoisophthalic Acid with 4-picoline**  
Tolan A., Özdemir A., Erdoğmuş G., TOPCU Y., İÇBUDAK H., HEREN Z.  
International Eurasian Conference on Biological and Chemical Sciences (EurasianBioChem 2018), Ankara, Turkey,  
26 - 27 April 2018, pp.935
- II. **Synthesis, thermal, spectroscopic and structural studies of lithium acesulfamate hydrate**  
RAKHİMBAYEVA A., HEREN Z., DEGE N., İÇBUDAK H.  
4th International Turk-Pak Conference on Chemical Sciences, 26 - 28 October 2017
- III. **An EPR study of Cu<sup>2+</sup> ions in [Zn(picol)<sub>2</sub>(H<sub>2</sub>O)<sub>2</sub>]<sup>-</sup>·2H<sub>2</sub>O single crystals.**  
KARABULUT B., ÖZTÜRK F., KESER C., HEREN Z.  
XXVIII. European Congress on Molecular Spectroscopy, İstanbul, Turkey, 03 September 2006

## Supported Projects

Heren Z., Project Supported by Higher Education Institutions, 5-metoksiindol-2-karboksilik asit karışık liganthı Zn(II) komplekslerinin sentezi, spektroskopik, kristallografik, antioksidan ve antibakteriyel özellikleri, 2019 - Continues