بسمه تعالی

فرم مشخصات اعضای هیات علمی دانشگاه پیام نور

مشخصات فردی

نام و نام خانوادگی: حمیدرضا زارع مهرجردی فرزند: محمود تاریخ تولد: ۱۳۵۷

وضعیت تاهل: متاهل وضعیت نظام وظیفه: معافیت کفالت مرتبه علمی: استادیار

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سوابق تحصیلی

کارشناسی: شیمی کاربردی از دانشگاه کاشان ۱۳۸۰-۱۳۷۶

کارشناسی ارشد: شیمی تجزیه از دانشگاه اصفهان ۱۳۸۳- ۱۳۸۰

دکتری: شیمی تجزیه از دانشگاه صنعتی شریف ۱۳۸۷- ۱۳۸۳

محل خدمت

دانشگاه پیام نور (استان یزد)

سوابق علمی- اجرایی

۱- همکاری با گروه شیمی در کمیته برگزاری جلسات سخنرانی و ارائه پوستر دومین سمینار ملی شیمی و محیط زیست در دانشگاه اصفهان

۲- TA آزمایشگاه‌های شیمی (تجزیه I وII، تصفیه آب و پساب‌های صنعتی، تجزیه نمونه‌های حقیقی و شیمی عمومیII) به مدت ۶ ترم در دوره کارشناسی ارشد در دانشگاه اصفهان (۱۳۸۰-۱۳۸۳)

۳- TA آزمایشگاه‌های شیمی (تجزیه I وII، تصفیه آب و پساب‌های صنعتی، و شیمی عمومیII) به مدت ۴ ترم در دوره دکتری در دانشگاه صنعتی شریف (۱۳۸۳-۱۳۸۵)

۴- تدریس در دانشگاه پیام نور واحد میبد به مدت ۴ ترم (قبل از عضویت هیات علمی در دانشگاه پیام نور)

۵- تدریس دروس تخصصی شیمی تجزیه در دوره کارشناسی و کارشناسی ارشد در پیام نورهای استان یزد از مهر ۱۳۸۷

مقالات

1- Reza Karimi Shervedani, Habibollah Kazemi, Andrzej Lasia, **Hamid Reza Zare-Mehrjardi,** Electrocatalytic behavior of thermally deposited RuO_2 into the microporous Raney nickel electrode (Ni-Zn-P-RuO_2) towards the HER, *JOURNAL OF NEW MATERIALS FOR ELECTROCHEMICAL SYSTEMS* 8 (3): 213-220 JUL 2005 .

2- Reza Karimi Shervedani , **Hamid Reza Zare-Mehrjardi,** Habibollah Kazemi, Electrochemical characterization and application of Ni-RuO_2 as a pH sensor for determination of petroleum oil acid number, *J. Iran. Chem. Soc.*, Vol. 4, No. 2,

3- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi,** Cobalt Salophen-modified carbon paste electrode incorporating a cationic surfactant for simultaneous voltammetric determination of ascorbic acid and dopamine, *Sensors and Actuators B* , 121(2007) 530-537.

4- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi**, Application of thionine-nafion supported on multi-walled carbon nanotube for preparation of a modified electrode in simultaneous voltammetric detection of dopamine and ascorbic acid, *Electrochimica Acta*, 2007, 52(22), 6310-6317.

5- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi**, Simultaneous Voltammetric determination of Uric Acid and Ascorbic Acid Using a Carbon-Paste Electrode Modified with Multi-Walled Carbon Nanotubes/Nafion and Cobalt(II)nitrosalophen, Electroanalysis 19, 2007, No. 21, 2234 – 2242.

6- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi**, Electrochemical Synthesis of Polypyrrole in the Presence of CongoRed; Application to Selective Voltammetric Determination of Dopamine in the Presence of Ascorbic Acid, Electroanalysis 2009, 21, No. 2, 157 – 164.

7- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi**, Modification of carbon paste with congo red supported on multi-walled carbon nanotube for voltammetric determination of uric acid in the presence of ascorbic acid, J Solid State Electrochem (2009) 13:1567–1575.

■ Five Articles are in revision.

PRESENTATIONS

1- Reza Karimi Shervedani **, Hamid Reza Zare-Mehrjardi,** Preparation and Interfacial Studies of Modified Polycrystalline Nickel Electrode as a Solid-State pH Sensor, 5th Biennial Electrochemistry Seminar of Iran, Kerman, 10-11 September 2003, Iran, Abstract No. 63.

2- Reza Karimi Shervedani , **Hamid Reza Zare-Mehrjardi**, Preparation and interfacial behavior study of a new solid state pH sensor, 14th Iranian Chemistry and Chemical Engineering Congress Tehran, Tarbiat moallem University, 17-19 February 2004, Abstract No.153 .

3- Reza Karimi Shervedani , **Hamid Reza Zare-Mehrjardi,** pH-Metric determination of acid number in petroleum oil with modified polycrystalline nickel electrode, 14th Iranian Chemistry and Chemical Engineering Congress Tehran, Tarbiat moallem University, 17-19 February 2004, Abstract No.154 .

4- Reza Karimi Shervedani , **Hamid Reza Zare-Mehrjardi,** Design a solid state pH sensor and its application for pH-metric determination of acid number in petroleum oil, 2004, Masshad.

5- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi,** Cobalt salophen-modified carbon-paste electrode incorporating a cationic surfactant for simultaneous voltammetric detection of ascorbic acid and dopamine, 15th Iranian Seminar of Analytical Chemistry, Shiraz, Shiraz University, February 27-March 1, 2007, No. 79.

6- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi,** Preparation of MWCNT/nafion/CoSal modified carbon-paste electrode and its application in Simultaneous voltammetric determination of uric acid and ascorbic acid, 7th Biennial Electrochemistry Seminar of Iran, Urmia, 28-30 August 2003, Iran, Abstract No. 324.

7- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi,** simultaneous voltammetric determination of dopamine and ascorbic acid using a carbon-paste electrode modified with thionine-nafion supported on multi-walled CNT, 7th Biennial Electrochemistry Seminar of Iran, Urmia, Urmia University, 28-30 August 2003, Iran, Abstract No. 323.

8- Saeed Shahrokhian, **Hamid Reza Zare-Mehrjardi**, Application of congo red supported on multi-walled carbon nanotube for preparation of a modified electrode in detection of uric acid in the presence of great amount of ascorbic acid , 12th International Conference on Electroanalysis, Prague, 16-19 June 2008, Abstract No. 152.

۹- حمیدرضا زارع مهرجردی، استفاده از نانولوله کربنی در اصلاح الکترود و کاربرد آن در اندازه گیری ترکیبات بیولوژیکی، همایش استانی نانو فناوری، پیام نور استان یزد، ۱۲و ۱۳ خرداد ۱۳۸۸

10-**Hamid Reza Zare-Mehrjardi,** Application of congo red supported on multi-walled carbon nanotube for preparation of a modified electrode in detection of uric acid in the presence of great amount of ascorbic acid, 6th Chemistry Conference, Payame Noor University of Abhar, 18-19 Oct 2008, Abstract No. 138.

11- **Hamid Reza Zare-Mehrjardi,** Modification of glassy carbon electrode by poly pyrrole-congo red film and its application in detection of dopamine in the presence of great amount of ascorbic acid, 6th Chemistry Conference, Payame Noor University of Abhar, 18-19 Oct 2008, Abstract No. 140.

12-**Hamid Reza Zare-Mehrjardi**, Naghmeh Hassanzadeh, Simultaneous Voltammetric Determination of Dopamine and Ascorbic Acid Using the Carbon Paste Electrode Modified with Schiff Base

Complex of Cobalt and Cationic Surfactant, 15th Iranian Chemistry Congress, Bu-Ali Sina University , Hamadan, 4-6 sep. 2011.

13-**Hamid Reza Zare-Mehrjardi**, Naghmeh Hassanzadeh**,** Simultaneous Voltammetric Determination of Dopamine and Ascorbic Acid Using a Glassy Carbon Electrode Modified with Carbon Nanotube and Cobalt Schiff Base Complex, National biotechnology conference, Payame Noor University of Yazd, 9-11 May.

14- **Hamid Reza Zare-Mehrjardi**, Naghmeh Hassanzadeh, Simultaneous Determination of Dopamine and Ascorbic Acid by Modified glassy carbon electrode with carbon nanotube-ionic liquid and nafion film, 9th National Chemistry Congress, Payame Noor University of Behshahr, 8-9 Oct. 2011.

15- **Hamid Reza zare-Mehrjardi**, Mohammad Hasan vakili-zarch, Modification of glassy carbon electrode by carbon nanotube-ionic liquid film and its application in simultaneous detection of dopamine and ascorbic acid, 9th National Chemistry Congress, Payame Noor University of Behshahr, 8-9 Oct. 2011.

16- **Hamid Reza Zare-Mehrjardi,**Fahimeh attari moghaddam, Preparation of modified carbon paste electrode with multi-walled carbon nanotube and study of it's response as a potentiometric pH sensor, 9th National Chemistry Congress, Payame Noor University of Behshahr, 8-9 Oct. 2011.

17- **Hamid Reza Zare-Mehrjardi,** Immobilization of methylene blue on MWCNT and its application in simultaneous detection of dopamine and ascorbic, 7th National Chemistry Congress, Payame Noor University of Shiraz, 21-23 Oct. 2009.

18- **Hamid Reza Zare-Mehrjardi,** The effect of functionalized MWCNT on the electrode response, 7th National Chemistry Congress, Payame Noor University of Shiraz, 21-23 Oct. 2009.

19- **Hamid Reza zare-Mehrjardi**, Mojtaba Arabi, Simultaneous Determination of Dopamine and Ascorbic Acid using glassy carbon electrode Modified with Azure A and Nafion, 10th Payame Noor Chemistry Conference, Kerman, Iran 10 October 2012.

20- **Hamid Reza zare-Mehrjardi**, Fatemeh khorrami, Simultaneous Voltammetric Determination of Acetaminophen and Ascorbic Acid Using the Electrodes Modified with Carbon Nanotube and so Schiff-Base Complex of cobalt, 10th Payame Noor Chemistry Conference, Kerman, Iran 10 October 2012.

طرح‌های پژوهشی

1- Detection of UA in the presence of great amount of AA at the surface of modified glassy carbon electrode

2- Improvement of electrode selectivity by modification with MWCNT-Methylene Blue

3- Preparation of Schiff base-modified carbon paste electrode and its application in detection of Ascorbic Acid

4- Improvement of electrode selectivity by modification with Azure-A

زمینه‌های علمی مورد علاقه

1. New materials for electrode fabrication, catalysts, hydrogen production and chemical sensors.
2. Electrode kinetics: Using cyclic voltammetry, Impedance spectroscopy, Polarization techniques.
3. Application of Self-Assembled mono and multi layer films in electro analytical chemistry, chemical sensor fabrication, and supramolecular technology.
4. Modification of CPE and GCE with CNT and surfactants for determination of biological analytes.

تکنیک‌های مورد استفاده:

1. Electrochemical Impedance Spectroscopy, Voltammetry, Potentiometry, and Tafel curves.
2. Optical spectroscopy (UV Visible).