Reza Badalzadeh

Curriculum Vitae

Personal Information

Date of Birth: 24.05.1980Place of birth: Tabriz, Iran

• Nationality: Iranian

 Work Address: Department of Physiology, Tabriz University of Medical Sciences, Tabriz, Iran.

• **Position:** Professor

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Educations/Thesis

PhD degree in Medical Physiology;

Tabriz University of Medical Sciences, Tabriz-Iran.

Title of PhD thesis: "Interfering influence of diabetes with cardioprotection by postconditioning on ischemia/reperfusion injury and its cellular-molecular mechanisms", (Excellent rank; 20 out of 20).

MSc degree in Medical Physiology;

Baqiatolla University of Medical Sciences, Tehran-Iran.

Title of MSc thesis: "The effects of lead poisoning on electrical, mechanical and hemodynamical alterations of rat isolated heart and its responsiveness to catecholamines", (Excellent rank; 19.86 out of 20).

MSc degree in Medical Education;

Tabriz University of Medical Sciences, Tabriz-Iran.

Title of MSc thesis: "Challenges of promoting research competency and performance of clinical residents of Tabriz university of medical sciences", (Excellent rank; 20 out of 20).

دکتر رضا بدلزاده دکتر رضا بدلزاده دکترای تخصصی (PhD) فیزیولوژی پزشکی کارشناس ارشد (MSc) آموزش پزشکی استاد گروه فیزیولوژی، دانشکده پزشکی، دانشگاه علوم پزشکی تبریز. تماس: ۴۱۳۳۳۶۴۶۶۴

سوابق شغلی و تجارب اجرائی

- ۱. عضو هیئت علمی و استاد گروه فیزیولوژی دانشکده پزشکی دانشگاه علوم پزشکی تبریز، ۸۷–۱۳۸۵ و ۱۳۹۰تاکنون
 - ۲. رئیس کتابخانه دانشکده پزشکی دانشگاه علوم پزشکی تبریز، ۱۳۹۸ تاکنون
 - ٣. معاون آموزشی تحصیلات تکمیلی گروه فیزیولوژی دانشگاه علوم پزشکی تبریز، ۱۳۹۵ تاکنون
 - ۴. معاون علمی و جانشین رئیس مرکز تحقیقات پزشکی مولکولی دانشگاه علوم پزشکی تبریز، ۱۴۰۰ تاکنون
 - ۵. عضو موسس و شورایعالی مرکز تحقیقات پزشکی مولکولی دانشگاه علوم پزشکی تبریز، ۱۳۹۵تاکنون
 - ۶. مسئول ارزشیابی اساتید دانشگاه علوم پزشکی تبریز، ۹۸-۱۳۹۴
 - ٧. مسئول حيطه تفكر علمي المپياد دانشجويان دانشگاه علوم پزشكي تبريز، ٩٧-١٣٩۴
 - ۸. مسئول برگزاری جلسات ژورنال کلاب گروه فیزیولوژی دانشکده پزشکی تبریز، ۹۵-۱۳۹۰
 - ۹. عضو کمیته ارزشیابی دانشکده پزشکی و EDC دانشگاه علوم پزشکی تبریز، ۱۳۹۸ تاکنون
 - ۱۰. عضو كميته علمي المپياد دانشجويان علوم پزشكي كل كشور وزارت بهداشت، ۹۸-۱۳۹۷
 - ۱۱. عضو کمیته ارزیابی رشته فیزیولوژی در کارگروه علوم پایه فرهنگستان علوم پزشکی کشور، ۱۴۰۱–۱۳۹۹
 - ۱۲. عضو کمیته تحقیقات راهبردی در علوم پایه دانشکده پزشکی دانشگاه علوم پزشکی تبریز، ۹۹-۱۳۹۷
- ۱۳. عضو کمیته اجرائی و علمی در برگزاری شانزدهمین و بیست و یکمین کنگره فیزیولوژی و فارماکولوژی ایران، دانشگاه های تربیت مدرس، ۱۳۸۴ و علوم پزشکی تبریز، ۱۳۹۲

تجارب علمی و اجرایی در ادوار مختلف المپیادهای دانشجویان علوم پزشکی کشور

- ۱. مسئول حیطه و مدرس حیطه تفکر علمی در علوم پایه هفتمین دوره المپیاد (کسب سه مدال طلا، نقره و برنز انفرادی توسط دانشگاه علوم پزشکی تبریز)-۱۳۹۴
- ۲. مسئول حیطه و مدرس حیطه تفکر علمی در علوم پایه هشتمین دوره المپیاد (کسب مدال طلای گروهی، و نقره و برنز
 انفرادی توسط دانشگاه علوم پزشکی تبریز)-۱۳۹۵
- ۳. مسئول حیطه و مدرس حیطه تفکر علمی در علوم پایه نهمین دوره المپیاد (کسب مدال برنز گروهی، دو نقره و یک برنز
 انفرادی توسط دانشگاه علوم پزشکی تبریز)-۱۳۹۶
- ۴. مسئول حیطه و مدرس حیطه تفکر علمی در علوم پایه دهمین دوره المپیاد (کسب مدال نقره گروهی، و مدال طلا، نقره و
 برنز انفرادی توسط دانشگاه علوم پزشکی تبریز)-۱۳۹۷
- ۵. عضو کمیته علمی، طراح سوال و داور یازدهمین دوره المپیاد دانشجویان دانشگاه های علوم پزشکی کشور، وزارت بهداشت،
 ۸۹-۹۸

عضویت های علمی

- ۱. انجمن فیزیولوژی و فارماکولوژی ایران، ۱۳۸۴ تاکنون
 - ۲. بنیاد ملی نخبگان، ۱۳۸۹ تاکنون
- ۳. دفتر استعدادهای درخشان دانشگاه علوم پزشکی تبریز، ۹۰-۱۳۸۷
 - ۴. باشگاه پژوهشگران جوان، ۹۰–۱۳۸۵
 - ۵. انجمن علمی گیاهان دارویی ایران، ۱۳۸۶
- ۶. کمیته داوری و ارزشیابی جشنواره های مطهری دانشگاه علوم پزشکی تبریز، ۱۳۹۶ تاکنون
 - ۷. کمیته های علمی، آموزشی و تحقیقاتی دانشگاه علوم پزشکی تبریز، ۱۳۹۱ تاکنون
 - ۸. شورای عالی و شورای پژوهشی مرکز تحقیقات پزشکی مولکولی تبریز، ۱۳۹۵ تاکنون
 - ۹. کمیته علمی المپیاد دانشجویان دانشگاه های علوم پزشکی کشور، ۹۸-۱۳۹۴

جوایز و رتبه ها

- ۱- کسب عنوان دانشجوی نمونه کشوری و دریافت تقدیرنامه از دست ریاست جمهوری سال ۱۳۸۹
- ۲- کسب رتبه اول دوره آموزشی دانشجویان دکترای تخصصی دانشکده یزشکی تبریز (بامعدل کل ۲۰) در سالهای ۹۰–۱۳۸۷
 - ۳- کسب عنوان محقق برتر و برنده جایزه استاد دکترگیتی انجمن فیزیولوژی و فارماکولوژی ایران سال ۱۳۸۸
- ۴- مسئول و مدرس برتر حیطه علوم پایه هشتمین، نهمین و دهمین المپیاد دانشجویان علوم پزشکی کشور سال ۹۷-۱۳۹۵
 - ۵- مدرس برتر حيطه علوم پايه هفتمين المپياد دانشجويان علوم پزشكي كشور سال ۱۳۹۴
 - ۶- کسب عنوان استادیار جوان و برتر بنیاد ملی نخبگان و دریافت گرنت پژوهشی سال ۱۳۹۴
 - ۷- کسب عنوان استادیار جوان و برتر وزارت بهداشت و دریافت گرنت پژوهشی سال ۱۳۹۳
 - ۸- کسب رتبه برتر تالیف کتاب در جشنواره کتاب جهاد دانشگاهی و بنیاد ملی نخبگان سال ۱۴۰۱
 - ۹- کسب رتبه برتر کتاب در جشنواره کتاب سال دانشجویی (برای ترجمه فیزیولوژی گانونگ) سال ۱۳۸۹
 - ۱۰- کسب عنوان دانشجوی پژوهشگر برتر مقطع دکترای تخصصی دانشگاه علوم پزشکی تبریز سال ۱۳۸۹
 - ۱۱- کسب عنوان محقق برتر دانشکده پزشکی دانشگاه علوم پزشکی تبریز سال ۱۳۸۸
 - ۱۲-کسب رتبه اول محقق و پژوهشگر برتر جشنواره باشگاه پژوهشگران جوان سال ۱۳۸۷
- ۱۳- کسب رتبه اول طرح پژوهشی و رتبه دوم مقاله در هفتمین و هشتمین جشنواره کشوری دانشجویان ممتاز، مبتکر و نوآور و دریافت تقدیرنامه از دست وزیر بهداشت در سالهای ۱۳۸۷ و ۱۳۸۸
 - ۱۴- کسب رتبه سوم مقاله در اولین همایش سراسری اندوتلیوم ایران-دانشگاه علوم پزشکی اصفهان سال ۱۳۸۸
 - ۱۵- کسب رتبه در آزمون دکتری تخصصی (PhD) فیزیولوژی وزارت بهداشت، درمان و آموزش پزشکی ایران سال ۱۳۸۶

Teaching Experiences

1. Teaching all fields of Medical Physiology (theory and applied courses) in Tabriz University of Medical Sciences and in its International branch (Aras), Iran, to the following students and levels:

PhD level and residents: PhD students of Physiology, residents of Dentistry

Doctoral level: students of Medicine, Dentistry, and Pharmacy;

MSc level: Master students of Physiology, Biophysics, Nursing, Biochemistry....

<u>Bachelor level:</u> students of faculty of Nursing and Midwifery; students of faculty of Nutrition and Health; students of faculty of Rehabilitation; students of faculty of Paramedicine and Laboratory Sciences.

- 2. Teaching all fields of Physiology (theory and applied courses) in Tarbiat Moallem University of Azarbaijan, Iran, to BSc Biology students.
- 3. Teaching all fields of Medical Physiology (theory and applied courses) in Islamic Azad University of Tabriz to students of Medicine, Nursing, Midwifery and Laboratory Sciences:
- 4. Teaching all fields of Physiology (theory and applied courses) in Azad University of Tabriz and Maragheh branches.
- 5. Teaching "Research Methodology and Scientific Writing" in Tabriz University of Medical Sciences.
- 6. Teaching the course "Database Searching" as scientific workshop for medical students.
- 7. Teaching the course "Laboratory Animals in Research" for medical students in workshop and summer school.
- 8. Teaching the course "Western Blotting" as serial scientific workshops.
- 9. Teaching the course "Concept Map" as serial scientific workshops in medical Olympiads.
- 10. Teaching the course "Scientific Thinking in Basic Sciences" as serial scientific workshops in medical students Olympiads.
- 11. Teaching the workshop "Scientific and critical thinking" for medical students.
- 12. Teaching the course "Adab-e-Pezeshki" for medical students.

Research Experiences and Skills

- 1. Isolated perfused heart in Langendorff set-up
- 2. Electrophysiological recording techniques such as voltage- and patch-clamp
- 3. Organ bath perfusion of isolated tissues
- 4. Myocardial infarction induction models in rat
- 5. In-vivo and ex-vivo modeling of myocardial and cerebral ischemia-reperfusion injury
- 6. Stem cell and mitochondrial transplantation into ischemic myocardium
- 7. Research methodology and scientific writing
- 8. Mitochondrial staining methods
- 9. Electrophoresis, real-time PCR, Western blot and immunoblotting
- 10. ELISA ...

Innovatory Activities

- 1. Constructing and assembling the research set-up of Langendorff Isolated Heart for small animals in Department of Physiology, Tabriz University of Medical Sciences, Iran, 2008.
- 2. Equipping the isolated tissue laboratory of Department of Physiology, Tabriz University of Medical Sciences, Iran, 2007.
- 3. Designing and equipping the laboratory of Cardiovascular Physiology in Department of Physiology, Tabriz University of Medical Sciences, Iran, 2011.
- 4. Setting up the biological signals recording systems in research, including Electrocardiography, Spirometry, Nerve and muscle functions recording, Organ bath, and Intra-arterial blood pressure measurement in Medical Faculty of Islamic Azad University of Tabriz Branch, Iran, 2012.
- 5. Constructing and assembling the research set-up of Langendorff Isolated Heart for small animals in Department of Physiology, Baqiatollah University of Medical Sciences, Iran, 2006.

Publications:

1. Books

- 1. Translating the 23rd edition of "**Ganong's Review of Medical Physiology**" to Persian, Jahan-Adib Publications, Tehran-Iran, 2010.
- 2. Summarizing the "**Medical Physiology**" in Persian, Andisheh Rafie Publications, Tehran-Iran, 2012.
- 3. Translating the 24rd edition of "Ganong's Review of Medical Physiology", Jahan-Adib and Sina-Teb Publications, Tehran-Iran, 2012.
- 4. Writing the "Essentials of Medical Physiology" in Persian, Golban Publications, Tehran-Iran, 2008.
- 5. Editing the first edition of "Clinical Biochemistry and Diagnostic Methods", Chargoon Publications, Tehran-Iran, 2012.
- 6. Editing the first edition of "**Concept Map**", Tabriz Medical University Publications, Tabriz-Iran, 2013.
- 7. Writing the book "Autophagy", National Elites Foundation and Jahad Daneshgahi Publications, 2023.
- 8. Writing the book "**Inflammatory Intestinal Diseases**", National Elites Foundation and Jahad Daneshgahi Publications, 2023.
- 9. Writing the book "Cardiac Ischemic Disease", National Elites Foundation and Jahad Daneshgahi Publications, 2022.

2. Articles in International Journals

- **1.** Gholami, S., **Badalzadeh, R***., & Alihemmati, A. (2023). Alpha-lipoic acid enhances ischemic postconditioning-mediated improvement of myocardial infarction and apoptosis in diabetic rats with ischemia/reperfusion injury. *Canadian journal of physiology and pharmacology*, 101(12), 682–691. https://doi.org/10.1139/cjpp-2023-0044
- 2. Meysam Karbasian, Negar Panahi, **Reza Badalzadeh**, Seyed Hamed Shirazi, Delavar Shahbazzadeh (2023). Regulation of Neuropeptide Y Receptor Gene Expression and Hormone Level in Obese Male Rats Receiving 6-Gingerol and L-Arginine Supplementation. *Archives of Razi Institute*, 10.22092/ARI.2023.362479.2747
- **3.** Sanaz Gholami, Behnaz Mokhtari, Aniseh Javadi, Poul Flemming Høilund-Carlsen, **Reza Badalzadeh***, Alireza Alihemmati (2023). Ischemic-Postconditioning Improves Myocardial Injury and Fibrosis Following Ischemia/Reperfusion Injury in Diabetic Rats Pretreated with Alpha-Lipoic Acid. ImmunoAnalysis.3: 10.
- **4.** Nejati-Koshki, K., Mokhtari, B., **Badalzadeh**, **R***., Arabzadeh, A., & Mohammadzadeh, A. (2023). Mitoprotective effect of mesenchymal stem cells-derived conditioned medium in myocardial reperfusion injury of aged rats: role of SIRT-1/PGC-1α/NRF-2 network. *Molecular biology reports*, 50(7), 5655–5665. Doi:10.1007/s11033-023-08499-x
- **5.** Mokhtari, B., & **Badalzadeh**, **R***. (2023). Mitochondria-targeted combination treatment strategy counteracts myocardial reperfusion injury of aged rats by modulating autophagy and inflammatory response. **Molecular biology reports**, 50(5), 3973–3983. https://doi.org/10.1007/s11033-023-08318-3
- **6.** Mokhtari, B., Høilund-Carlsen, P. F., Chodari, L., Yasami, M., **Badalzadeh, R***., & Ghaffari, S. (2023). Melatonin/nicotinamide mononucleotide/ubiquinol: a cocktail providing superior cardioprotection against ischemia/reperfusion injury in a common comorbidities modelled rat. **Molecular biology reports**, 50(4), 3525–3537. https://doi.org/10.1007/s11033-022-08189-0
- **7.** Mokhtari, B., Hamidi, M., **Badalzadeh, R***., & Mahmoodpoor, A. (2023). Mitochondrial transplantation protects against sepsis-induced myocardial dysfunction by modulating mitochondrial biogenesis and fission/fusion and inflammatory response. *Molecular biology reports*, 50(3), 2147–2158. https://doi.org/10.1007/s11033-022-08115-4
- **8.** Mokhtari, B., Hosseini, L., Høilund-Carlsen, P. F., Salehinasab, R., Rajabi, M., & **Badalzadeh, R***. (2023). The additive effects of nicotinamide mononucleotide and melatonin on mitochondrial biogenesis and fission/fusion, autophagy, and microRNA-499 in the aged rat heart with reperfusion injury. *Naunyn-Schmiedeberg's archives of pharmacology*, 396(8), 1701–1711. https://doi.org/10.1007/s00210-023-02383-y
- **9.** Mokhtari, B., Abdi, A., Athari, S. Z., Nozad-Charoudeh, H., Alihemmati, A., & **Badalzadeh, R***. (2023). Effect of troxerutin on the expression of genes regulating mitochondrial biogenesis and microRNA-140 in doxorubicin-induced testicular toxicity. *Journal of research in medical sciences*, 28, 35. https://doi.org/10.4103/jrms.jrms_120_22

- **10.** Aboalghasem Taghavi Holagh, Hossein Abed Natanzi, **Reza Badalzadeh**, Farshad Ghazalian (2022). Investigate the combination effect of Troxerotin and high-intensity interval training on expression of mitophagy genes Mfn2 and Parkin and Doxorubicin-induced cardiotoxicity in rat cardiac cells. *Feyz*, 26(6): 676-682.
- **11.** Mokhtari, B., & **Badalzadeh, R***. (2022). Protective and deleterious effects of autophagy in the setting of myocardial ischemia/reperfusion injury: an overview. *Molecular biology reports*, 49(11), 11081–11099. https://doi.org/10.1007/s11033-022-07837-9
- **12.** Behnaz Mokhtari Farid Masoud, Aniseh Javadi, **Reza Badalzadeh*** (2022). The Role of Mitochondrial ATP-Sensitive Potassium Channels in Cardioprotective and Anti-Inflammatory Effects of Troxerutin in Myocardial Reperfusion Injury. *Iranian Journal of Pharmaceutical Sciences*, 18(4): 355-365.
- **13.** Sadat-Ebrahimi, S. R., Rezabakhsh, A., Aslanabadi, N., Asadi, M., Zafari, V., Shanebandi, D., Zarredar, H., Enamzadeh, E., Taghizadeh, H., & **Badalzadeh**, **R***. (2022). Novel diagnostic potential of miR-1 in patients with acute heart failure. *PloS one*, 17(9), e0275019. https://doi.org/10.1371/journal.pone.0275019
- **14.** Khosroshahi, A. J., Mokhtari, B., & **Badalzadeh**, **R***. (2022). Combination of nicotinamide mononucleotide and troxerutin induces full protection against doxorubicin-induced cardiotoxicity by modulating mitochondrial biogenesis and inflammatory response. *Molecular biology reports*, 49(9), 8209–8218. https://doi.org/10.1007/s11033-022-07390-5
- **15.** Siroos Choobineh, Khadijeh Ebrahimi, Rahman Soori, **Reza Badalzadeh** (2022). Protective Effect of High-Intensity Interval Training on Doxorubicin-Induced Cardiotoxicity by Reducing MiR-499 Expression in Male Rats. *Journal of Sport Biosciences*, 14(2):5-16.
- **16.** Mokhtari, B., Yavari, R., **Badalzadeh, R***., & Mahmoodpoor, A. (2022). An Overview on Mitochondrial-Based Therapies in Sepsis-Related Myocardial Dysfunction: Mitochondrial Transplantation as a Promising Approach. *The Canadian journal of infectious diseases & medical microbiology*, 3277274. https://doi.org/10.1155/2022/3277274
- **17.** Gholami, S., Mokhtari, B., & **Badalzadeh, R***. (2022). Alpha-lipoic acid potentiates the anti-arrhythmic effects of ischemic postconditioning in the setting of cardiac ischemia/reperfusion injury in diabetic rats. *Journal of diabetes and metabolic disorders*, 21(1), 707–716. https://doi.org/10.1007/s40200-022-01034-y
- **18.** Rajabi, M., Vafaee, M. S., Hosseini, L., & **Badalzadeh**, **R***. (2022). Pretreatment with nicotinamide mononucleotide increases the effect of ischaemic postconditioning on cardioprotection and mitochondrial function following ex vivo myocardial reperfusion injury in aged rats. *Clinical and experimental pharmacology & physiology*, 49(4), 474–482. https://doi.org/10.1111/1440-1681.13616
- **19.** Mokhtari, B., Abdoli-Shadbad, M., Alihemmati, A., Javadi, A., & **Badalzadeh**, **R***. (2022). Alpha-lipoic acid preconditioning plus ischemic postconditioning provides additional protection against myocardial reperfusion injury of diabetic rats: modulation of autophagy

- and mitochondrial function. *Molecular biology reports*, 49(3), 1773–1782. https://doi.org/10.1007/s11033-021-06987-6
- **20.** Hashemi, P., Nouri-Vaskeh, M., Alizadeh, L., Baghbanzadeh, A., **Badalzadeh, R**., Askari, E., & Baradaran, B. (2022). NETosis in ischemic/reperfusion injuries: An organ-based review. *Life sciences*, 290, 120158. https://doi.org/10.1016/j.lfs.2021.120158
- **21.** Ghaffari-Nasab, A., **Badalzadeh, R**., Mohaddes, G., Javani, G., Ebrahimi-Kalan, A., & Alipour, M. R. (2022). Young Plasma Induces Antidepressant-Like Effects in Aged Rats Subjected to Chronic Mild Stress by Suppressing Indoleamine 2,3-Dioxygenase Enzyme and Kynurenine Pathway in the Prefrontal Cortex. *Neurochemical research*, 47(2), 358–371. https://doi.org/10.1007/s11064-021-03440-9
- **22.** Abolhasanpour, N., Alihosseini, S., Golipourkhalili, S., **Badalzadeh, R**., Mahmoudi, J., & Hosseini, L. (2021). Effect of Melatonin on Endoplasmic Reticulum-Mitochondrial Crosstalk in Stroke. *Archives of medical research*, 52(7), 673–682. https://doi.org/10.1016/j.arcmed.2021.04.002
- **23.** Mokhtari, B., & **Badalzadeh**, **R***. (2021). The potentials of distinct functions of autophagy to be targeted for attenuation of myocardial ischemia/reperfusion injury in preclinical studies: an up-to-date review. *Journal of physiology and biochemistry*, 77(3), 377–404. https://doi.org/10.1007/s13105-021-00824-x
- **24.** Ghaffari-Nasab, A., **Badalzadeh, R**., Mohaddes, G., & Alipour, M. R. (2021). Young plasma administration mitigates depression-like behaviours in chronic mild stress-exposed aged rats by attenuating apoptosis in prefrontal cortex. *Experimental physiology*, 106(7), 1621–1630. https://doi.org/10.1113/EP089415
- **25.** Ali Ojaghi, Farshad Ghazalian, Tohid Vahdatpour, Hosein Aabednatanzi, **Reza Badalzadeh** (2021). The effect of progressive endurance training on heart resistance induced by infusion ischemia in healthy male rats. *Daneshvar Medicine*, 29(2):68-78.
- **26.** Aboalghasem Taghavi Holagh, Hosein Aabednatanzi, **Reza Badalzadeh**, Farshad Ghazalian (2021). The effect of Troxerutin combined with high intensity interval training on heart injury and expression of antioxidant genes in doxorubicin-induced cardiac toxicity in male rats. *Daneshvar Medicine*, 29(153):79-90.
- **27.** Mokhtari, B., **Badalzadeh**, **R***., & Aboutaleb, N. (2021). Modulation of autophagy as the target of mesenchymal stem cells-derived conditioned medium in rat model of myocardial ischemia/reperfusion injury. *Molecular biology reports*, 48(4), 3337–3348. https://doi.org/10.1007/s11033-021-06359-0
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- **20. Badalzadeh R**, Ghiasi R, Mohammadi M, Sepehri GR (2009). Effect of mebudipine on hemodynamical functions of isolated heart during ischemia-reperfusion insult. 10th International Research Congress of Medical Students, Tehran-Iran.
- **21.** Mohammadi M, Mirzaei F, Rashidi B, **Badalzadeh R** (2009). Effect of amlodipine on concentration of endothelin-1 in renal artery of rabbits receiving atherogenic regimen. First National Congress of Endothelium, Isfahan-Iran.
- **22. Badalzadeh Reza**, Mohammadi Mustafa, Ghiyasi Rafigeh, Sepehri Ghoramreza, Shoarian Ziba (2009). The effect of mebudipine on electrical activity and myocardial arrhythmias in

- isolated rat heart injured by ischemia-reperfusion. 19th Iranian Congress of Physiology and Pharmacology, Shahid Beheshti University of Medical Sciences, Tehran-Iran.
- **23.** Mustafa Mohammadi, Salimeh Afshin, **Reza Badalzadeh**, Gisou Mohhaddes, Amir Monsor Vatankhah (2009). Effect of exercise on lipid peroxidation and oxidative stress in isoproterenol-induced cardio injury in male rats. 19th Iranian Congress of Physiology and Pharmacology, Shahid Beheshti University of Medical Sciences, Tehran-Iran.
- **24.** Rafigeh Ghyasi, Mustafa Mohammadi, **Reza Badalzadeh**, Amir Monsor Vatankhah, Hadi Ibrahimi, Ali Naghinazhad (2009). Evaluating the effect of mebudipine on stress oxidative and antioxidant defense in myocardial ischemic-reperfusion injury in male rat. 19th Iranian Congress of Physiology and Pharmacology, Shahid Beheshti University of Medical Sciences, Tehran-Iran.
- **25.** Mirzaei F, Afshin S, Mohammadi M, **Badalzadeh R**, Rashidi B, Mohaddes G (2009). Protective effect of treadmill exercise on lipid peroxidation and histological changes in isoproterenol-induced myocardial injury. 19th Iranian Congress of Physiology and Pharmacology, Shahid Beheshti University of Medical Sciences, Tehran-Iran.
- **26.** Mohamad Rahmati, Hosein Bannazadeh, Davood Fazli, Yousef Rasmi, **Reza Badalzadeh** (2009). Long fasting dependent changes in the serum levels of cholesterol, triglyceride, HDL-C, LDL-C, estrogen and progesterone in young women during Ramadan. *J. Iran. Chem. Soc.*, *Vol. 6, Suppl.*, *S20-S72*. 10th Iranian Congress of Biochemistry & 3rd International Congress of Biochemistry and Molecular Biology, Tehran-Iran.
- **27. Reza Badalzadeh,** Mustafa Mohammadi, Rafigeh Ghiyasi, Ali Abdi (2010). Anti-Arrhythmic Effect of Mebudipine in Isolated Rat Heart Injured by Ischemia-Reperfusion. 26th Congress of Cardiology, Istanbul-Turkey.
- **28.** Mustafa Mohammadi, Iraj Salehi, Fariba Mirzaei, **Reza Badalzadeh** (2010). Effect of Amlodipine on Heart Tissue Concentration of Endothelin in Rabbits Receiving Atherogenic Diet. 26th Congress of Cardiology, Istanbul-Turkey.
- **29. Reza Badalzadeh**, Mustafa Mohammadi, Ali Abdi (2010). Effect of supplementation with diosgenin against myocardial infarction induced by ischemia-reperfusion injury. 11th Iranian Nutrition Congress, Shiraz-Iran.
- **30. Badalzadeh Reza**, Mohammadi Mustafa, Najafi Moslem (2011). Diabetes mellitus abolishes the cardioprotective effect of ischemic postconditioning against ischemia/reperfusion injury in rat: role of lipid peroxidation. International Congress on Biochemistry, Mashhad-Iran.
- **31. Badalzadeh Reza**, Najafi Moslem, Mohammadi Mustafa (2011). Impairment of nitric oxide production is responsible for the failure of the cardioprotection by ischemic postconditioning in diabetic rats. 27th Cardiology Congress, Istanbul-Turkey.
- **32. Badalzadeh Reza**, Mohammadi Mustafa, Najafi Moslem, ahmadiasl Naser, Farajnia Safar (2011). Loss of cardioprotection by ischemic postconditioning against ischemia/reperfusion injury in diabetic rats: role of the mitochondrial permeability transition pores. 20th Iranian Congress on Physiology and Pharmacology, Hamedan-Iran.

- **33. Badalzadeh Reza**, Mohammadi Mustafa, Najafi Moslem, ahmadiasl Naser, Farajnia Safar (2011). Loss of cardioprotection by ischemic postconditioning against ischemia/reperfusion injury in diabetic rats: role of the mitochondrial permeability transition pores. 20th Iranian Congress on Physiology and Pharmacology, Hamedan-Iran.
- **34. Reza Badalzadeh**, Mustafa Mohammadi1, Moslem Najafi (2011). Impairment of nitric oxide production is responsible for the failure of the cardioprotection by ischemic postconditioning in diabetic rats. *Türk Kardiyol Dern Arş 2011, Suppl 1*; 27th Congress of Cardiology, Istanbul-Turkey.
- **35. Badalzadeh R**, Mohammadi M, Yousefi B, Hodaei D (2012). Preconditioning of ischemic myocardium with diosgenin protects it against reperfusion injury. 13th Congress of the International Society for Ethnopharmacology. Graz, Austria.
- **36.** Ebrahimi Hadi, **Badalzadeh Reza**, Mohammadi Mustafa, Shoarian Ziba, Yousefi Bahman (2013). Diosgenin reduces inflammatory response induced by myocardial ischemia-reperfusion injury. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **37.** Yousefi Bahman, **Badalzadeh Reza**, Mohammadi Mustafa (2013). Diosgenin-induced protection against myocardial ischemia-reperfusion injury is mediated to some extent by nitric oxide system. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **38.** Reza Balaei Abriz, **Reza Badalzadeh**, Seyyed Mahmoud Tabatabai, GholamReza Mohammad Nejad (2013). Evaluating the effect of methanol extract of cinnamon on blood lactate dehydrogenase and liver enzymes in broiler chickens infected with Escherichia Coli. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **39.** Naser Ahmadiasl, Hadi Yousefi, **Reza Badalzadeh**, Alireza Alihemmati (2013). Investigation of effects of renal ischemia reperfusion (IRI) on inflammatory response and apoptosis of heart in male rat. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **40.** Zolfagharzadeh N, **Badalzadeh R**, Hajihoseini R, Adeli S (2013). Concommitant effect of metanolic extraction of cinnamon and aerobic training on antioxidant power of myocardium in ischemia reperfusion injury. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **41.** Alireza Alihemmati, Naser Ahmadiasl, Hadi Yousefi, **Reza Badalzadeh** (2013). Investigation of effects of renal ischemia reperfusion (IRI) on inflammatory responses and apoptosis of lungs in male rat. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **42. Badalzadeh Reza**, Mohammadi Mustafa, Yousefi Bahman (2013). Ischemic postconditioning and cyclosporine-A protect diabetic myocardium from reperfusion injury by an additive effect: role of anti-inflammatory action. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.

- **43.** Mohammadi Mustafa, **Badalzadeh Reza**, Shaghaghi Mehrnoosh, Dehghan Gholamreza, Ebrahimi Hadi (2013). The effect of aerobic training and Cinnamon supplementation on heart function, biochemical alterations and lipid profile following exhaustive exercise in male rats. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **44.** GholamReza Mohammad Nejad, Seyyed Mahmoud Tabatabai, **Reza Badalzadeh** (2013). The effect of cinnamon extract on blood lipid profile and liver creatine kinase in broilers chiken infected with Escherichia Coli. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **45.** Abbaszadeh A, Oryan Sh, **Badalzadeh R** (2013). Effect of postconditioning on inflammation induced by myocardial reperfusion injury in male Wistar rat. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **46.** Heydarzadeh F, **Badalzadeh R**, Hatami H, Norouzi E (2013). Effect of troxerutin on oxidative stress induced by ischemia reperfusion injury in diabetic heart of rat. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **47.** Adeli S, **Badalzadeh R**, Hajihoseini R, Zolfagharzadeh N (2013). Concommitant effect of metanolic extraction of cinnamon and aerobic training on inflammatory mediators of myocardium in ischemia reperfusion injury. 21st National and International Congress on Physiology and Pharmacology, Tabriz-Iran.
- **48. Badalzadeh R**, Javadi A, Mohammadi M (2015). Involvement of glycogen synthase kinase-3β and oxidation in the postconditioning induced cardioprotection loss in chronic diabetic male rats. 22^{ed} National and International Congress on Physiology and Pharmacology, Kashan-Iran.
- **49.** Javadi A, **Badalzadeh R**, Zolfagharzadeh N (2015). Combined preconditioning with cinnamon extract and aerobic training reduces oxidative stress of myocardial reperfusion injury in rat model. FAOPS congress, Bangkok-Thailand.
- **50. Badalzadeh R,** Javadi A, Mohammadi M (2015). Reducing reperfusion injury in diabetic myocardium through combined postconditioning with ischemia and cyclosporine-A: oxidative stress and histo-pathological changes. FAOPS congress, Bangkok-Thailand.
- **51. Badalzadeh R**, et al (2019). Conducting a symposium on Cardioprotection in Ischemia Reperfusion Injury. 24th National and International Congress on Physiology and Pharmacology, Tehran-Iran.
- **52. Badalzadeh R**, et al (2023). Conducting a symposium on Role of Inflammation in Cardiovascular Diseases. 26th National and International Congress on Physiology and Pharmacology, Semnan-Iran.

53.

Workshops (Participant or Lecturer)

- 1. Article Writing (2003); Baqiatollah University of Medical Sciences and Tarbiat Modarres University, Tehran-Iran.
- 2. Research on Behavioral Sciences (2003); Pasteur Institute, Tehran-Iran.
- 3. Teaching Methods (2004); Baqiatollah University of Medical Sciences, Tehran-Iran.
- 4. Research Methodology and Search Database (2004); Baqiatollah University of Medical Sciences, Tehran-Iran.
- 5. Bioinformatics and Gene product Analyzing (2007); Tabriz University, Tabriz-Iran.
- 6. Principles and Applications of Real time polymerase chain reaction (RT-PCR) (2008); Biotechnology Research Center, Tabriz University of Medical Sciences, Tabriz-Iran.
- 7. Reference Manager (Preliminary) (2008); Yasudj University of Medical Sciences, Yasudj-Iran.
- 8. Qualitative Studies in Medical Sciences (2008); Yasudj University of Medical Sciences, Yasudj-Iran.
- 9. Electrophysiological Recording techniques (2008); Shahid Beheshti University of Medical Sciences, Tehran-Iran.
- 10. Reference Manager (Advanced) (2009); Tabriz University of Medical Sciences, Tabriz-Iran.
- 11. National Workshop on Powerlab Recording Systems and Advanced Techniques in Biosciences (2009); ADInstruments Company of Australia and Eqlim-Danesh Company of Iran, Tehran-Iran.
- 12. Modern Arena in Production of Herbal Medicine (2008); Golestan University of Medical Sciences, Gorgan-Iran.
- 13. Research Methodology and Scientific Writing (2009); Tabriz University of Medical Sciences, Tabriz-Iran.
- 14. Article Reviewing (2010); Tabriz University of Medical Sciences, Tabriz-Iran.
- 15. Ethics in Medical Research (Experimental, Clinical and Epidemiological Research) (2011); Tabriz University of Medical Sciences, Tabriz-Iran.
- 16. Principles of effective learning in electronic education (2010); EDC center, Tabriz University of Medical Sciences, Tabriz-Iran.
- 17. Electrophysiological methods and cardiac action potential recordings. (2011); Cardiovascular research center, Golestan University of Medical Sciences, Gorgan-Iran.
- 18. Western Blotting (2013); Tabriz University of Medical Sciences, Tabriz-Iran. (Lecturer-Manager).
- 19. Molecular techniques in Medicine (2013); Tabriz University of Medical Sciences, Tabriz-Iran. (Lecturer-Manager).
- 20. Application of Nanotechnology in Medical Sciences (2014); Tabriz University of Medical Sciences, Tabriz-Iran. (Lecturer-Manager).
- 21. Concept Map and Preparation to Medical Olympiad (2015-1017); Tabriz University of Medical Sciences, Tabriz-Iran. (Lecturer).
- 22. Scientific Writing (2015); Tabriz University of Medical Sciences, Tabriz-Iran. (Lecturer).
- 23. Professional Ethics in Medical Sciences (2018); Tabriz University of Medical Sciences, Tabriz-Iran.

24.

Research Projects and Thesis supervising

Research Projects: more than 60 PhD thesis supervising: 12 Medical Resident supervising: 5 MSc thesis supervising: 18 MSc thesis Advising: 5 MD thesis supervising: 20,

Professional Reviewing

Reviewing for International ISI Journals: more than 30 journals

Reviewing for National Journals: more than 15 journals

Reviewing for Book: 5

Reviewing for Research Projects: more than 100 Reviewing for Student Thesis: more than 50

Language Skills

1. **Turkish**; Mother tongue

2. **Persian**; National language

3. English; Good, Academic certificated

4. Arabic; Basic

Computer Skills

- 1. Proficient user of Microsoft Office (MS Word, PowerPoint, Excel), Internet,
- 2. Proficient user of SPSS, Graphpad prism, Reference managers, Powerlab systems and Charts,

Research Interests

- 1. Study of the electrophysiological properties of cardiac and neural cells with ischemic disorders in the presence of risk factors and comorbidities.
- 2. Study of the ionic channels function in cellular and biological membranes in physiologic and pathologic conditions especially in ischemia-reperfusion injury of the heart and brain.
- 3. Study of the interaction of aging and diabetes with cerebral and cardiovascular disorders.
- 4. Study of the role of mitochondria and autophagy in myocardial infarction.
- 5. Review of the literature, high capacity of research ideas, methods of knowledge improvement.....

References: Available upon request.