









HOSSEIN FALLAHI (PhD, MSc, BSc)

ASSOCIATE PROFESSOR
BIOINFORMATICS & MOLECULAR BIOLOGY

PERSONAL INFORMATION

Surname: Fallahi
First name: Hossein
Marital Status: Married-no kid
Nationality: Iranian
Date of birth: 25.05.1976
Place of Birth: Tehran- Iran
Languages: Native Persian speaker,
 Fluent in English,
 basic understanding of Arabic

CONTACT INFORMATION

 Work: +98(833)-4274545
 Mobile: +98(9127177784)
 fallahi.hossein@gmail.com
 h.fallahi@razi.ac.ir
 Department of Biology, Razi
 University, Kermanshah, Iran
 [Google Scholar](#)
 [Lab website](#)
 [PubMed](#)

EDUCATION

Degree	Year	Major	University
PhD	Oct 2004- Oct 2008	Mol. Genetics	ANU, Australia
MSc	Sep 1999- July 2002	Cell & Mol. Biology	Razi Uni. Iran
BSc	Sep 1995-July 1999	General Biology	Shiraz Uni. Iran

SKILLS

Main (Bioinformatics Skills)

Linux and Mac OS
Python Programming
R Programming
Perl programming
NGS analysis
Gene regulatory networks analysis
Machine Learning



Minor (Wet lab skills)

RESEARCH INTERESTS

- Cancer epigenetics and gene expression-insight from high-throughput data
- NGS, RNAseq, small RNAseq, Microarray and other forms of high-throughput data analysis
- Bioinformatics, Systems biology and Molecular evolution
- Gene and protein functional network analysis
- Data mining in biological databases
- Cancer and Stem cell biology, Regenerative and personalized medicine

◆ Molecular biology techniques including:

DNA and RNA preps, Blotting (Southern, northern), DNA sequencing, PCR techniques (primer design, semi-quantitative PCR, quantitative PCR, RAPD), Gene cloning techniques (vector design, manipulation and transformation)

◆ Biochemistry techniques including:

Protein extraction and purification, Enzyme assays, SDS-PAGE and western blotting, Carbohydrate analysis, Chromatography (ion exchange, gel filtration)

◆ Microscopy techniques including:

Bright-field and fluorescence microscopy, Digital imaging, Fixation, embedding and sectioning, Immunolocalization and in situ hybridisation, Histological staining

◆ General and PC2 laboratory maintenance skills

HOBBIES

- Sports (Cycling, Tennis)
- Running and walking in Nature
- Reading about cognitive sciences and philosophy
- Watching Sci. documentaries.

WORK EXPERIENCE

▪ **ASSOCIATE PROFESSOR • RAZI UNIVERSITY • AUGUST 2020-ONGOING**

Main responsibilities include:

- a) Teaching Computational Biology, Bioinformatics, Systems Biology, Advanced molecular biology and Genetics
- b) Supervising and advising PhD & MSc students.

▪ **HEAD OF BIOINFORMATICS LAB: (RAZI UNIVERSITY) SEP 2019-ONGOING**

STUDENTS' SUPERVISION



Master Student

1. Farhangyain M. (Razi University)
2. AzarAfrouz A. (Razi University)
3. Falsafi N. (Razi University)
4. Soleimani T. (Razi University)
5. Azarian S. (Shahrekord University)
6. Ebrahimi Sh. (Shahrekord University)
7. Hematyar M. (Shahrekord University)
8. Yaqubi M. (NIGEB)
9. Mohammadnia AS. (NIGEB)
10. Ahmadi L. (Shahrekord University)
11. Fadaie A. (Shahrekord University)
12. Aminzadeh S. (Razi University)
13. Mahmoudi F. (Razi University)
14. Amiri M. (Razi University)
15. Varzandian M. (Razi University)
16. Samadian E. (Razi University)
17. Mirzaghay S. (Razi University)
18. Aref M. (Razi University)
19. Ahmadi M. (Razi University)
20. Daneshfar R. (Razi University)
21. Fattahi H. (Razi University)
22. Pour Nazari M. (Razi University)
23. Nazari K. (Razi University)

PhD Students

1. Shaghghi N. (Razi Uni)
2. Merati T (Razi Uni)
3. Ghosay A (International Stu. Razi Uni)
4. Laftah A (International Stu. Razi Uni)
5. Laftah H (International Stu. Razi Uni)
6. Moradi B (Razi Uni)

Lab address: <https://hossein-fallahi.github.io/Fallahi-Bioinformatics-Lab/>

▪ ASSITANT PROFESSOR • RAZI UNIVERSITY • JUL 2009- AUGUST 2020

Main responsibilities include:

- a) Teaching Computational Biology, Bioinformatics, Systems Biology, Advanced molecular biology and Genetics
- b) Supervising and advising PhD & MSc students.

▪ RESEARCH ASSISTANT, COTTON RESEARCH GROUP, CSIRO. AUG 2007- MAR 2009.

Analysis of transgenic plants, which were transformed with constructs to modify the level of SUS activity in cotton.

▪ RESEARCH ASSISTANT, MPP GROUP, RSBS. OCT 2007- MAR 2009.

Isolation and characterisation of Arabidopsis mutants for CO₂ compensation point.

▪ RESEARCH ASSISTANT, MPP GROUP, RSBS AND PI, CSIRO. DEC 2007- MAR 2009.

To investigate the effects of polyploidy on the performances of plants with 4n chromosomal sets in comparison to those with 2n chromosomal set.

▪ TEACHING ASSISTANT IN “BIOCHEMISTRY OF THE CELL” COURSE, BIOCHEMISTRY AND MOLECULAR BIOLOGY DEPARTMENT (BAMBI), ANU, 2004-08 (6 SEMESTERS)

supervising undergraduate students during experiments and marking reports and exam papers.



7. Mousavi S (Shahrekord Uni)
8. Alisoltani A (Shahrekord Uni)
9. Karimi M (Shahrekord Uni)
10. Moradi B (Shahrekord Uni)
11. Sohrabi S (Lorestan Uni)
12. Motalebi R (Shahrekord Uni)



WORKSHOPS AND COURSES THOUGHT

Talks and workshops:

- Invited keynote-speaker at the workshop on “RNA-Seq technology and data analysis”, 18th - 19th September 2013, Shahrekurd University, Shahrekurd, Iran
- Invited keynote-speaker at the workshop on “micro-RNA Biogenesis and Analysis”, 2^{ed} - 5th October 2012, Shahrekurd University, Shahrekurd, Iran.
- Organized an Immunoinformatics workshop (instructor) at the “11th International congress of Immunology and Allergy”, 26th - 29th April 2012. Milad Tower, Tehran, Iran
- Invited keynote-speaker at the workshop on “Molecular, genomics and bioinformatics solution to improve plants under abiotic stresses”, 1st - 4th November 2010, Shahrekurd University, Shahrekurd, Iran.
- Organised an Immunoinformatics workshop (instructor) at the “10th International congress of Immunology and Allergy”, 10th - 12th May 2010. Shahid Beheshti Medical School, Tehran, Iran.

Courses:

- Graduate courses (PhD and master students): Immunoinformatics, Nanoinformatics, Bioinformatics, Advanced Molecular Biology, Molecular Evolution, Biotechnology and Scientific Writings. (Since Sep. 2009)
- Undergraduate courses: Bioinformatics, Epigenetics, Systems Biology, Principles of Genetics, Cell and Molecular biology, Introductory Molecular Genetics and Scientific Writings, Topics in Genetics. (Since Sep. 2010)

PUBLICATIONS AND PRESENTATIONS

Note: *represent Corresponding author & Impact factors as JULY 2025

- 1) Radak M, Ravand FK, Ghamari N, **Fallahi H***. 2025 “Genetic Signatures Upon Transition from Colorectal Polyps to colon Cancer”. Current Tissue Microenvironment Reports, 1-15
- 2) Karimi M, Shiran B*, Rabei B, **Fallahi H**, Deri BB. 2025” Arabidopsis Cold Stress Tolerance Improvement via AthHOS1-targeting HOS1-amiRNA Approach”. Journal of Agricultural Science & Technology 27 (2)
- 3) Aref M, Sisakhtnezhad S*, **Fallahi H**. 2024 “Investigating the effect of Quercetin in the presence of CoCl₂ as an inducing hypoxia agent on the biological characteristics of human telomerase reverse transcription”. Ecotoxicology and Environmental Safety 288, 117389
- 4) Radak M, **Fallahi H***. 2024 “Cell–cell communication in stem cells and cancer: Alone but in touch”. Fundamental & Clinical Pharmacology 38 (3), 479-488



- 5) Radak M, **Fallahi H***. 2024 “Unraveling molecular similarities between colorectal polyps and colorectal cancer: a systems biology approach”. Intestinal research 22 (2), 199-207
- 6) Radak M, **Fallahi H***. 2023 “The Epigenetic Regulation of Quiescent in Stem Cells”- Global Medical Genetics (IF=1.9)
- 7) Radak M, Ghamari N, **Fallahi H***. 2023 “Identification of common factors among Fibrosarcoma, Rhabdomyosarcoma, and Osteosarcoma by network analysis”- BioSystems (IF=1.7)
- 8) **Fallahi H***, Radak M, Yadegari ZS.2023 “Uncovering systems-level molecular similarities between Alzheimer’s and Parkinson’s diseases”- Neuroscience and Behavioral Physiology (IF=ND)
- 9) Radak M, Yabr-Lafta H, **Fallahi H***. 2023 “Machine learning and deep learning techniques for breast cancer diagnosis and classification: a comprehensive review of medical imaging studies”- Journal of Cancer Research and Clinical Oncology (IF=3.7)
- 10) Radak M, Ghamari N, **Fallahi H***. 2023 “Common factors among three types of cells aged in mice”-Biogerontology (IF=4.3)
- 11) Radak M, **Fallahi H***. 2023 “Zbp1 gene: a modulator of multiple aging hallmarks as potential therapeutic target for age-related diseases”-Biogerontology (IF=4.3)
- 12) Godini R, **Fallahi H**, Pocock R*. 2022 “The regulatory landscape of neurite development in *Caenorhabditis elegans*”- Frontiers in Molecular Neuroscience (IF=5.4)
- 13) Godini R, **Fallahi H***. 2021. “Dynamics of transcription regulatory network during mice-derived retina organoid development”- Gene (IF= 2.8)
- 14) Karami K, Akbari M, Moradi MT, Soliemani B*, **Fallahi H***. 2021. “Survival prognostic factors in patients with acute myeloid leukemia using machine learning techniques”- PLOS ONE (IF=2.66)
- 15) Sohrabi SS, Ismaili A*, Nazarian Firouzabadi F, **Fallahi H**. 2021 “Identification of key genes and molecular mechanisms associated with temperature stress in lentil”- Gene (IF=6.205)
- 16) Godini R, **Fallahi H***. 2019. “Genome Imprinting and Stem Cells”- Gene Expression Pattern (IF=1.50)



- 17) **Fallahi H***, Godini R. **2019**. “System-level Responses to Cisplatin in Pre-Apoptotic Stages of Breast Cancer Cell Line MCF-7”- Computational Biology and Chemistry (IF=1.41)
- 18) Godini R, Pocock R, **Fallahi H***. **2019**. “*Caenorhabditis elegans* hub genes that respond to amyloid beta are homologs of genes involved in human Alzheimer’s disease”- PLOS ONE (IF=2.66)
- 19) Godini R, **Fallahi H***. **2019**. “A brief overview of the concepts, methods and computational tools used in phylogenetic tree construction and gene prediction”- Meta Gene
- 20) Karami K, Zerehdaran S*, Javadmanesh A, Shariati MM, **Fallahi H***. **2019**. “Characterization of Bovine (*Bos taurus*) imprinted genes from genomic to amino acid attributes by data mining approaches”- PLOS ONE (IF=2.66)
- 21) Falsafi N, Soleimani T, **Fallahi H***, Azadbakht M. **2019**. “Regulatory Networks Upon Neurogenesis Induction in PC12 cell line by Small Molecules”- Journal of Cellular Physiology (IF=3.94)
- 22) Karami K, Zerehdaran S*, Javadmanesh A, Shariati MM, **Fallahi H***. **2019**. “Classification of maternal and paternal imprinted genes in Bovine (*Bos Taurus*) using supervised machine learning algorithms”- Journal of Animal Breeding and Genetics, DOI: 10.1111/jbg.12379 (IF=1.94)
- 23) Moradi MT, **Fallahi H**, Rahimi Z*. **2018**. “Interaction of LncRNA MEG3 with MiRNAs: A Reciprocal Regulation”- Journal of Cellular Biochemistry, DOI: 10.1002/jcb.27604. (IF=2.96)
- 24) Eshaghi M, Shiran B*, **Fallahi H**, Ravash R, Banovic B. **2018**. “Identification of genes involved in steroid alkaloid biosynthesis in *Fritillaria imperialis* via de novo transcriptomics”- Genomics, DOI: 10.1016/j.ygeno.2018.09.008. (IF=2.910)
- 25) Godini R, **Fallahi H***. **2018**. “Dynamics Changes in the Transcription Factors During Early Human Embryonic Development”- Journal of Cellular Physiology, DOI: 10.1002/jcp.27386. (IF= 3.94)
- 26) Godini R, **Fallahi H***, Ebrahimie E. **2018**. “Network Analysis of Inflammatory Responses to Septic Reaction by Neutrophils and Peripheral Blood Mononuclear Cells”- PLOS ONE, DOI: 10.1371/journal.pone.0201674. (IF=2.66)
- 27) Godini R, **Fallahi H***, Ebrahimie E. **2018**. “A Comparative System-Level Analysis of the Neurodegenerative Diseases” - Journal of Cellular Physiology, DOI: 10.1002/jcp.27330. (IF= 3.94)



- 28) Godini R, **Fallahi H***. 2018. "Shortening the list of essential genes in the human genome by network analysis". Meta Gene, DOI:10.1016/j.mgene.2018.05.001
- 29) Godini R, Yabr-Lafta H, **Fallahi H***. 2018. "Epigenetic modifications in the embryonic and induced pluripotent stem cells". Gene Expression Pattern, DOI: 10.1016/j.gep.2018.04.001. (IF= 1.15)
- 30) Alisoltani A, Shiran B, Rahpeyma Sarvestani N, **Fallahi H**, Feto NA, Ebrahimie E*. 2017. "Changes in Microsatellite Motifs in Response to Abiotic Stresses: a Case Study Using Wheat and Rice RNA-sequencing Data". Asian Journal of Scientific Research, DOI: 10.3923/ajsr.2018.12.21. (IF=0.75)
- 31) Soleimani T, Falsafi N, **Fallahi H***. 2017. "Dissection of regulatory elements during direct conversion of somatic cells into neurons". Journal of Cellular Biochemistry, DOI: 10.1002/jcb.25944. (IF= 3.45)
- 32) Esmaeili F, Shiran B*, **Fallahi H**, Mirakhorli N, Ebrahimie E, Budak H, Martinez-Gomez P. 2017. "In silico search and biological validation of microRNAs related to drought response in peach and almond". Functional & Integrative Genomics. 1-13. DOI:10.1007/s10142-016-0488-x. (IF=3.50)
- 33) Karimi M, Ghazanfari F, Fadaei A, Ahmadi L, Shiran B*, Rabei M, **Fallahi H***. 2016. "The small-RNA profiles of almond (*Prunus dulcis* Mill.) reproductive tissues in response to cold stress". PLoS ONE. 11(6), e0156519. DOI: 10.1371/journal.pone.0156519. (IF= 3.23)
- 34) Mohammadnia AS, Yaqubi M, Pourasgari, **Fallahi H***, Massumi M. 2016. "Signalling and Gene Regulatory Networks Governing Definitive Endoderm Derivation from Pluripotent Stem Cells". Journal of Cellular Physiology. DOI: 10.1002/jcp.25308. (IF=3.84)
- 35) Alisoltani A, Azarian S, Ebrahimi Sh, Hematyar M, Shiran B*, Jahanbazi H, **Fallahi H**, Mousavi S, Rafiei F. 2016. "Parallel consideration of SSRs and differentially expressed genes under abiotic stress for targeted development of functional markers in almond and related *Prunus* species". Scientia Horticulturae. 198,462-472. DOI: 10.1016/j.scienta.2015.10.020. (IF=1.365)
- 36) Alisoltani A, Shiran B*, **Fallahi H**, Ebrahimie E. 2015." Gene regulatory network in almond (*Prunus dulcis* Mill.) in response to frost stress". Tree Genetics & Genomes 11 (5) 1-15. DOI 10.1007/s11295-015-0929-z. (IF=2.456)



- 37) Ebrahimi R, Mirlohi Sh, Khalaji F, Fakhari Z, Fakhari Z, Shiran B*, **Fallahi H**, Rafiei F, Budak H, Ebrahimie E. **2015**. "Differential expression of seven conserved microRNAs in response to abiotic stress and their regulating network in *Helianthus annuus*". Frontiers in Plant Science, 6 (741), 1-14. DOI: 10.3389/fpls.2015.00741. (IF=3.95)
- 38) Shirani Bidabadi M, Shiran B*, **Fallahi H**, Rafiei F, Esmaili F, Ebrahimie E. **2015**. "Identification of differential expressed transcripts of almond (*Prunus dulcis* var. Sefied) in response to water-deficit stress by cDNA-AFLP". Journal of forest research. DOI: 10.1007/s10310-015-0494-1. (IF=1.01)
- 39) Esmaili F, Shiran B*, Mirakhorli N, **Fallahi H**. **2015**. "Analysis of expression patterns of miR159, miR171 under drought stress in peach, almond and GN". Frontiers in Plant Science. Modern Genetics. (Accepted). (In Persian accompanied by English abstract, IF = not determined)
- 40) Rahmani-Badi A, Sepehr S*, **Fallahi H**. **2015**. "Dissection of the cis-2-decenoic acid signalling network in *Pseudomonas aeruginosa* using microarray technique". Frontiers in Microbiology, 6 (383), 1-13 DOI: 10.3389/fmicb.2015.00383. (IF=3.90)
- 41) Yaqubi M, Mohammadnia AS, **Fallahi H***. **2015**. "Predicting Involvement of Polycomb Repressive Complex 2 in Direct Conversion of Mouse Fibroblasts into Induced Neural Stem Cells". Stem Cell Research & Therapy, 6:42, 1-13. DOI: 10.1186/s13287-015-0045-x. (IF= 4.63)
- 42) Alisoltani A, Shiran B*, Ebrahimie E, **Fallahi H**, Mousavi S, et al. **2015** "Differential expression of genes related to macromolecule metabolic process under cold stress in almond (*Prunus dulcis* Mill) using RNA-seq analysis". Modern Genetics. (Accepted). (In Persian accompanied by English abstract, IF = not determined)
- 43) Alisoltani A, **Fallahi H***, Shiran B, Alisoltani A, Ebrahimie E. **2015** "RNA-Seq SSRs and small RNA-Seq SSRs, new approaches in cancer biomarker discovery". Gene. DOI: 10.1016/j.gene.2015. 01.027. (IF=2.2)
- 44) Akrami H*, Aminzadeh S, **Fallahi H**. **2014**. "Inhibitory effect of ibuprofen on tumour survival and angiogenesis in gastric cancer cell". Tumour Biology. DOI: 10.1007/s13277-014-2952-3. (IF=2.8)
- 45) Mohammadnia AS, Yaqubi M, **Fallahi H***. **2014**. "Transcription factors regulatory network upon early lung immune response to tuberculosis in mouse". Molecular Medicine Reports. DOI:10.3892/mmr.2015.3721. (IF=1.55)



- 46) Mousavi S, Alisoltani A, Shiran B*, **Fallahi H**, Ebrahimie E, et al. **2014**. "De Novo Transcriptome Assembly and Comparative Analysis of Differentially Expressed Genes in *Prunus dulcis* Mill. In response to Freezing Stress". PLoS ONE 9(8): e104541. DOI: 10.1371/journal.pone.0104541. (IF=3.53)
- 47) Rahmani-Badi A, Sepehr S*, Babaie-Naiej H, Mohammadi P, Soudi MR, **Fallahi H**. **2014**. "A combination of cis-2-Decenoic acid and antibiotics eradicates pre-established catheter-associated biofilms". Journal of Medical Microbiology. DOI: 10.1099/jmm.0.075374-0. (IF=2.4)
- 48) Mohammadnia AS, Yaqubi M, **Fallahi H***. **2014**. "Predicting transcription factors in human alcoholic hepatitis from gene regulatory network". European Review for Medical and Pharmacological Sciences. 19 (12), 2246-2253. (IF=1.21)
- 49) Ebrahimi R, Shiran B*, Ebrahimie E, **Fallahi H**. **2014**. "The Effect of Heat Stress on Expression Alternation of miR398 on *Helianthus annuus* L.". Crop Biotech. Autumn and winter, 5: 49-59. (In Persian accompanied by English abstract, IF = not determined)
- 50) Alisoltani A, **Fallahi H**, Ebrahimi M, Ebrahimi M, Ebrahimie E*. **2014**. "Prediction of Potential Cancer-Risk Regions Based on Transcriptome Data: Towards a Comprehensive View", PLOS ONE, 9(5): e96320. (IF=3.53)
- 51) Badger M.R*, **Fallahi H**, Kaines S, Takahashi T. **2009**. "Chlorophyll fluorescence screening of *Arabidopsis thaliana* for CO₂ sensitive photorespiration and photoinhibition mutants". Functional Plant Biology, 36(11): 867–873. (IF=2.929)
- 52) **Fallahi H**, Scofield G.N, Badger M.R, Chow W.S, Furbank R.T*, Ruan Y-L. **2008**. "Localization of sucrose synthase in developing seed and silique of *Arabidopsis thaliana* reveals diverse roles for SUS during development". Journal of Experimental Botany, 59(12): 3283-3295. (IF=5.364)
- 53) Furbank R.T*, **Fallahi H**, Badger M.R, Estavillo G.M, Pogson B, Walter A. **2007**. "Arabidopsis thaliana functional genomics". Photosynthesis Research, 91(2-3), 277. (IF=3.243)
- 54) **Fallahi H**, Motallebi M*, Zamani M.R*. **2007**. "Purification and partial characterization of a polygalacturonase from a virulent isolate of *Ascochyta rabiei* (IK06), causal agent of the *Ascochyta* blight in chickpea". Journal of Science and Technology of Agriculture and Natural Resources, 10(4B): 381-392. (In Persian accompanied by English abstract, IF = not determined)



POSTER PRESENTATIONS, TALKS AND ABSTRACTS:

- 1) Yabr Lafta H, **Fallahi H**, Yari Kh. **2018**. "Assessing genetic mutations in Chronic Myeloid Leukaemia (CML) patients using whole exome sequencing". The 3rd International & 15th National Genetics Congress. 13th–15th May, Tehran, Iran.
- 2) Hadi F, Godini R, **Fallahi H**. **2018**. "Dissection of plasmacytoid dendritic cell's responses to influenza virus-based network analysis". ICIA 2018, The 14th International Congress of Immunology and Allergy. 26th–28th April, Tehran, Iran.
- 3) Hadi F, Godini R, **Fallahi H**. **2018**. "Analysis of transcription factors involved in responses of plasmacytoid dendritic cells to influenza virus". ICIA 2018, The 14th International Congress of Immunology and Allergy. 26th–28th April, Tehran, Iran.
- 4) Godini R, Hadi F, **Fallahi H**. **2018**. "Detection of blood cells' genes involved in responding sepsis by weighted gene co- expression network analysis". ICIA 2018, The 14th International Congress of Immunology and Allergy. 26th–28th April, Tehran, Iran.
- 5) Godini R, Hadi F, **Fallahi H**. **2018**. "Dissection of neutrophils responses to sepsis via network analysis: From weighted co-expression networks to protein-protein and gene regulatory networks". ICIA 2018, The 14th International Congress of Immunology and Allergy. 26th–28th April, Tehran, Iran.
- 6) Radak M, Godini R, **Fallahi H**. **2018**. "Mycophenolic acid treatment alters gene regulatory network of gastric cancer cell line AGS". The 7th Conference on Bioinformatics, 3th–5th January, Tehran, Iran.
- 7) Radak M, Godini R, **Fallahi H**. **2018**. "Detection of hub genes and protein complexes in gastric cancer cell line AGS exposed to mycophenolic acid by network0based analysis". The 7th Conference on Bioinformatics, 3th–5th January, Tehran, Iran.
- 8) Azarafrouz F, **Fallahi H**, Akrami H. **2018**. "Regulatory Network in MKN045 Cell Line in Response to Ibuprofen". The 7th Conference on Bioinformatics, 3th–5th January, Tehran, Iran.
- 9) Azarafrouz F, **Fallahi H**, Akrami H. **2018**. "Notch pathway Gene Network in Colorectal Cancer Drug Treatment". The 7th Conference on Bioinformatics, 3th–5th January, Tehran, Iran.
- 10) Farhangian M, **Fallahi H**, Akrami H. **2018**. "Identification of Transcription Factors in Gastric Cancer Cell Line Response to Ibuprofen". The 7th Conference on Bioinformatics, 3th–5th January, Tehran, Iran.
- 11) Farhangian M, **Fallahi H**, Akrami H. **2018**. "Differentiation gene expression of Notch signaling pathway response to Ivermectin". The 7th Conference on Bioinformatics, 3th–5th January, Tehran, Iran.
- 12) Godini R, **Fallahi H**. **2017**. "Differentiation gene expression of Notch signaling pathway response to Ivermectin". The 9th International Tehran Breast Cancer Congress (TBCC9), 18th–20th October, Tehran, Iran.



- 13) Godini R, **Fallahi H**. 2017. "Prediction of hub transcription factors of breast cancer cells in response to cisplatin treatment". The 9th International Tehran Breast Cancer Congress (TBCC9), 18th-20th October, Tehran, Iran.
- 14) Azarafrouz F, Farhangian M, **Fallahi H**. 2017. "Epigenetic Marks Comparison between Blood Cell Derived from iPSCs and ESCs".13th Congress on Stem Cell Biology and Technology (Royan), 30th August -1st September, Tehran, Iran.
- 15) Azarafrouz F, **Fallahi H**. 2017. "Methylation Variation between Reprogramming of Different Types of Somatic Cells into iPSCs".13th Congress on Stem Cell Biology and Technology (Royan), 30th August - 1st September, Tehran, Iran.
- 16) Farhangian M, **Fallahi H**. 2017. "Differentiation Capacity of iPSCs Derived from Different Somatic Cells in Blood Cells Generation".13th Congress on Stem Cell Biology and Technology (Royan), 30th August -1st September, Tehran, Iran.
- 17) Farhangian M, Azarafrouz F, **Fallahi H**. 2017. "The Regulatory Aspects of Transcriptome between Different iPSCs Resulting from Different Somatic Cells".13th Congress on Stem Cell Biology and Technology (Royan), 30th August -1st September, Tehran, Iran.
- 18) Falsafi N, **Fallahi H**, Azadbakht M. 2017. "Identification of Regulatory miRNAs Involved in Cell Death during Neuronal Reprogramming".13th Congress on Stem Cell Biology and Technology (Royan), 30th August -1st September, Tehran, Iran.
- 19) Falsafi N, **Fallahi H**, Azadbakht M. 2017. "Identification of Transcription Factors Involved in Staurosporine Induced Cell Death in PC12 Cell Line".13th Congress on Stem Cell Biology and Technology (Royan), 30th August -1st September, Tehran, Iran.
- 20) Soleimani T, **Fallahi H**, Azadbakht M. 2017. "Identification of Transcription Factors Involved in Conversion of PC12 Cells into Neuron-Like Cells by Staurosporine".13th Congress on Stem Cell Biology and Technology (Royan), 30th August -1st September, Tehran, Iran.
- 21) Soleimani T, **Fallahi H**, Azadbakht M. 2017. "Dissecting miRNAs Regulatory Network Involved Neurogenesis of PC12 Cells Induced by Staurosporine".13th Congress on Stem Cell Biology and Technology (Royan), 30th August -1st September, Tehran, Iran.
- 22) Falsafi N, **Fallahi H**, Azadbakht M. 2017. "Network analysis of microRNAs involved in cell death of PC12 cell line induced by trimethyltin". 2nd International Congress on Stem Cells and Regenerative Medicine, 19th-21th April, Mashhad, Iran.
- 23) Falsafi N, **Fallahi H**, Azadbakht M. 2017. "Transcription factors involved in cell death of PC12 cell line induced by trimethyltin". 2nd International Congress on Stem Cells and Regenerative Medicine, 19th-21th April, Mashhad, Iran.



- 24) Soleimani T, **Fallahi H**, Azadbakht M. **2017**. "Analysis of regulatory miRNAs involved in conversion of PC12 cell line into neurons by nerve growth factor induction". 2nd International Congress on Stem Cells and Regenerative Medicine, 19th-21th April, Mashhad, Iran.
- 25) Soleimani T, **Fallahi H**, Azadbakht M. **2017**. "Identification of common TFs and microRNAs involved in direct conversion of PC12 cell line into neuronal0like cells by NGF or EGF induction". 2nd International Congress on Stem Cells and Regenerative Medicine, 19th-21th April, Mashhad, Iran.
- 26) Falsafi N, Soleimani T, **Fallahi H**. **2016**. "MiR-9, miR-30 and miR-520 are involved in direct conversion of fibroblast into neuron", The 6th Conference on Bioinformatics, 13th-15th December, Tehran, Iran.
- 27) Soleimani T, Falsafi N, **Fallahi H**. **2016**. "Analysis of regulatory microRNAs in the neural growth factor (NGF)-induced PC12 cell line", The 6th Conference on Bioinformatics, 13th-15th December, Tehran, Iran.
- 28) Soleimani T, Falsafi N, **Fallahi H**. **2016**. "Analysis of regulatory transcription factors upon direct conversion of fibroblast into neurons", The 6th Conference on Bioinformatics, 13th-15th December, Tehran, Iran.
- 29) Falsafi N, Soleimani T, **Fallahi H**. **2016**. "Identification of transcription factors involved in conversion of PC-12 cell line into neuronal-like cell by NGF induction", The 6th Conference on Bioinformatics, 13th-15th December, Tehran, Iran.
- 30) Azarafrouz F, Farhangian M, **Fallahi H**. **2016**. "MiR29 Depletion Causes Differential Methylation Pattern of Cell Cycle Related Genes upon Direct Conversion of Fibroblast into iPS Cells", The 6th Conference on Bioinformatics, 13th-15th December, Tehran, Iran.
- 31) Farhangian M, Azarafrouz F, **Fallahi H**. **2016**. "Differential Methylation Pattern in the Autophagy Related Genes Following Reprogramming of Fibroblast into iPS Cells via miR-29 Depletion", The 6th Conference on Bioinformatics, 13th-15th December, Tehran, Iran.
- 32) Yabr Lafta, **Fallahi H**. **2016**. "Exploring The miRNAs Involvement In Chronic Myeloid Leukemia (CML)", The 6th Conference on Bioinformatics, 13th-15th December, Tehran, Iran.
- 33) Yabr Lafta, **Fallahi H**. **2016**. "Evaluating the role of Micro-RNAs During Different Stages of Breast Cancer", The 6th Conference on Bioinformatics, 13th-15th December, Tehran, Iran.
- 34) Soleimani T, Falsafi N, **Fallahi H**. **2016**. "Dissection of Regulatory Elements During Direct Conversion of Somatic Cells to Neurons", 17th Reproductive and 12th stem cell Royan Congress, August 31th-September 2^{ed}, Tehran, Iran.
- 35) Falsafi N, Soleimani T, **Fallahi H**. **2016**. "Finding Regulatory Elements in Direct Conversion of Fibroblast to Cardiomyocytes Using Chemical Cocktails", 17th Reproductive and 12th stem cell Royan Congress, August 31th- September 2^{ed}, Tehran, Iran.



- 36) **Fallahi H**, Barani S. **2016**. "Predicting Targeting of Yamanaka's Factors by Micro-Proteins", 17th Reproductive and 12th stem cell Royan Congress, August 31th- September 2^{ed}, Tehran, Iran.
- 37) Heydari M, Kakavandi N, Mahdiuni H, **Fallahi H**. **2016**. "A comparative study on the binding affinity of some anti-inflammatory painkiller drugs with COX1 and COX2 using molecular docking", 14th Iranian clinical biochemistry congress, August 16-18, Tehran, Iran.
- 38) Kakavandi N, Heydari M, **Fallahi H**, Mahdiuni H. **2016**. "A comparative study on the binding affinity of some non-steroid drugs with COX1 and COX2 using molecular modeling and docking analysis", 14th Iranian clinical biochemistry congress, August 16-18, Tehran, Iran.
- 39) Omarmeli V, Albonaim A, **Fallahi H**. **2016**." In search for possible $\Delta 32$ -CCR5 donors for AIDS therapy in Iranian population", 2^{ed} International and 14th Iranian Genetics Congress, May 21-23, Tehran, Iran.
- 40) Raoufi E, Hemmati M, Einabadi H, **Fallahi H**. **2015**. "Predicting candidate epitopes on Ebola virus for possible vaccine development", International Symposium on Network Enabled Health Informatics, Biomedicine and Bioinformatics (Hi-Bi-Bi), August 26-27, Paris, France.
- 41) Bahrebar I, Mohammadnia AS, Yaqubi M, **Fallahi H**. **2014**. "Differences between ESC and ntESC based on constructed gene regulatory network", 18th National and 6th International Congress of Biology in Iran, August 26-29, Karaj, Iran.
- 42) Rastegar-Pouyani sh, **Fallahi H**. **2014**. "Post translational status of proteins involved in colorectal and prostate cancers can be altered by nsSNPs", 18th National and 6th International Congress of Biology in Iran, August 26-29, Karaj, Iran
- 43) Jamshidnejad T, **Fallahi H**. **2014**. "Evolutionary coordinated amino acids positions in actin proteins", 18th National and 6th International Congress of Biology in Iran, August 26-29, Karaj, Iran
- 44) Yaqubi M, Mohammadnia AS, **Fallahi H**, Massumi M. **2014**. "Dissection of gene regulatory network involved in direct reprogramming of mouse fibroblast into neural stem cells", International Society for Stem Cell Research (ISSCR), 12th Annual Meeting, Jun 18-21, Vancouver, Canada.
- 45) Mohammadnia AS, Yaqubi M, **Fallahi H**, Sabouni F, Massumi M. **2014**. "Prediction of central transcription factors in gene regulatory network during iPS differentiation to primary neurosphere in mouse". International Society for Stem Cell Research (ISSCR), 12th Annual Meeting, Jun 18-21, Vancouver, Canada.
- 46) Massumi M, Yaqubi M, Mohammadnia AS, **Fallahi H**. **2014**. "Predicting regulators of mouse embryonic fibroblast reprogramming into induced pluripotent stem cell based on gene regulatory network". International Society for Stem Cell Research (ISSCR), 12th Annual Meeting, Jun 18-21, Vancouver, Canada.



- 47) Mohammadnia AS, Yaqubi M, Esmaeili S, **Fallahi H. 2014.** “Dissecting transcription factors regulatory network to identify regulators of MAPK signaling pathway during differentiation iPSCs to primary neurosphere”. First International and 13th Iranian Genetics Congress, May 24-26, Tehran, Iran.
- 48) Mohammadnia AS, Yaqubi M, Khazae N, **Fallahi H. 2014.** “Predicting central genes in protein-protein interaction network during mouse fibroblast to cardiomyocyte conversion”. First International and 13th Iranian Genetics Congress, May 24-26, Tehran, Iran.
- 49) Akbari B, Yaqubi M, Mohammadnia AS, **Fallahi H. 2014.** “Cytoskeleton protein-protein interaction network during differentiation of human iPSCs to immature astrocyte”. First International and 13th Iranian Genetics Congress, May 24-26, Tehran, Iran.
- 50) Omrani MR, Yaqubi M, Mohammadnia AS, **Fallahi H. 2014.** “Possible transcription factors involved in conversion of fibroblast into induced pluripotent stem cells in mouse”. First International and 13th Iranian Genetics Congress, May 24-26, Tehran, Iran.
- 51) Khazaei N, Mohammadnia AS, Yaqubi M, **Fallahi H. 2014.** “Transcription factors involved in protein complexes during direct reprogramming of mouse fibroblast into cardiomyocyte”. First International and 13th Iranian Genetics Congress, May 24-26, Tehran, Iran.
- 52) Khazaei N, Mohammadnia AS, Yaqubi M, **Fallahi H. 2014.** “Using Gene Regulatory Network to find central transcription factors in conversion of mouse cardiac fibroblast into cardiomyocyte”. First International and 13th Iranian Genetics Congress, May 24-26, Tehran, Iran.
- 53) Bahrebar I, Mohammadnia AS, Yaqubi M, **Fallahi H. 2014.** “Regulation of BMP signaling pathway during human embryonic body formation from embryonic stem cells”. First International and 13th Iranian Genetics Congress, May 24-26, Tehran, Iran.
- 54) Yaqubi M, Mohammadnia AS, Esmaeili S, **Fallahi H. 2014.** “Motif pattern recognition and MAPK signaling pathway analysis during direct reprogramming of mouse fibroblast and differentiation of iPS cells to neural stem cells”. First International and 13th Iranian Genetics Congress, May 24-26, Tehran, Iran.
- 55) Alisoltani A, **Fallahi H.**, Ebrahimie E, Shiran B. **2014.** “Prediction of stress related chromosomes using transcriptome data”. The 5th Iranian Conference on Bioinformatics, May 20-22, Tehran, Iran.
- 56) Alisoltani A, Mousavi S, Shiran B, **Fallahi H.**, Ebrahimie E, Imani A, Houshmand S. **2014.** “RNA-seq based network analysis of almond transcriptome unraveled the role of proline dehydrogenase in frost stress”. The 5th Iranian Conference on Bioinformatics, May 20-22, Tehran, Iran.
- 57) Alisoltani A, Ebrahimie E, **Fallahi H.**, Ebrahimie M, Alisoltani A. **2013.** “Network centre on MALAT1 as a down expressed gene in breast and ovarian cancers”. 6th BCRC Breast Cancer Congress, Nov 6-8, Tehran, Iran.



- 58) Alisoltani A, Ebrahimi E, **Fallahi H**, Shiran B, Alisoltani A. **2013**. "Application of EST-SSR Markers to Breast Cancer Diagnosis". 6th BCRC Breast Cancer Congress, Nov 6-8, Tehran, Iran.
- 59) Alisoltani A, Alisoltani A, Ebrahimie E, **Fallahi H**, Ebrahimie M. **2013**. "Comparison of gene expression in normal and cancerous breast tissues using Digital Differential Display tool". 6th BCRC Breast Cancer Congress, Nov 6-8, Tehran, Iran.
- 60) Yaqubi M, Esmacili S, Mohammadnia AS, **Fallahi H**. **2013**. "Protein-protein interaction network analysis for finding affected signaling pathways during induced angiogenesis by glucose deprivation". National Student Biosciences Congress, September 25-26, Isfahan, Iran.
- 61) Khazaei N, Yaqubi M, Mohammadnia AS, **Fallahi H**. **2013**. "Gene Regulatory Network analysis for find central genes and signaling pathways in early immune response to Tuberculosis in mouse". National Student Biosciences Congress, September 25-26, Isfahan, Iran.
- 62) Khazaei N, Mohammadnia AS, Yaqubi M, **Fallahi H**. **2013**. "Using dynamic network for finding signaling pathways of A549 cells under H5N2 infection". National Student Biosciences Congress, September 25-26, Isfahan, Iran.
- 63) Mohammadnia AS, Yaqubi M, **Fallahi H**. **2013**. "Signaling network analysis during acute kidney rejection". National Student Biosciences Congress, September 25-26, Isfahan, Iran.
- 64) Esmaili S, Azizian M, Yaqubi M, Mohammadnia AS, **Fallahi H**. **2013**. "Using microarray data to construct network and its analysis for kidney transplant rejection". 3rd International Student Biotechnology Congress, May 6-8, Tehran, Iran.
- 65) Khazaie N, Yaqubi M, Mohammadnia AS, **Fallahi H**. **2013**. "From microarray data to gene expression pattern, network and protein analysis in *Mus musculus* under *Helicobacter pylori* infection". 3rd International student Biotechnology Congress, May 6-8, Tehran, Iran.
- 66) Mohammadnia M, Azizian M, Yaqubi M, Mohammadnia AS, **Fallahi H**. **2013**. "Effects of phosphate limitation on *Saccharomyces cerevisiae* gene expression pattern and its expression network analysis". 3rd International student Biotechnology Congress, May 6-8, Tehran, Iran.
- 67) **Fallahi H**, Yari Kh. **2012**. "Long α -helices in proteins are not originated through merging or extension of the shorter helices". 4th Iranian Conference on Bioinformatics, November 6–7, Tehran, Iran
- 68) **Fallahi H**, MirAghaee S. **2012**. "Protein Sectors In alpha helices; finding highly coordinated positions in alpha helices". 4th Iranian Conference on Bioinformatics, November 6–7, Tehran, Iran
- 69) Mohammadnia AS, Yaqubi M, **Fallahi H**. **2012**. "Applications of freely available microarray data in comparison analysis of gene expression in brain and pancreas tumors". 4th Iranian Conference on Bioinformatics, November 6–7, Tehran, Iran



- 70) Yaqubi M, Mohammadnia AS, **Fallahi H. 2012.** “Comparative gene expression pattern analysis in colon, stomach and breast cancer using microarray data”. 4th Iranian Conference on Bioinformatics, November 6–7, Tehran, Iran
- 71) Yaqubi M, Mohammadnia AS, **Fallahi H. 2012.** “Gene expression pattern analysis in colon cancer using freely available microarray data”. 17th national & 5th International Conference of Biology of Iran, September 4-6, Kerman, Iran
- 72) **Fallahi H**, Masoudipour E, Mohammadnia AS, Yaqubi M, Esmaili S. **2012.** “Positional preference of nucleotides in riboswitches”. 17th national & 5th International Conference of Biology of Iran, September 4-6, Kerman, Iran
- 73) **Fallahi H**, Bidmeshkipour A. **2012.** “Dissecting alpha helices in HIV proteins”. ISCB's second Latin America conference, March 19-21, Santiago, Chile
- 74) **Fallahi H. 2011.** “Comparing α -helices and β -sheets in thermophilic and mesophilic proteins”. 10th International Conference on Bioinformatics and the 1st ISCB-Asia, November 30 – December 2, Kuala Lumpur, Malaysia.
- 75) Yarani R, Amiri M, **Fallahi H. 2011.** “Positional preferences of 20 amino acids toward different positions of alpha helices in thermostable proteins” Clinical Biochemistry, 44 (No.13 -Supplement) – S105-S106.
- 76) Amiri M, **Fallahi H**, Mahdiuni H. **2011.** “Isolation of several proteases and an α -amylase from *Bacillus subtilis* ATCC1254”. Clinical Biochemistry, 44 (No.13 -Supplement) –S251.
- 77) Mirzaghahi S, Akrami H, Mansouri K, **Fallahi H. 2011.** “Anti-angiogenic activity of ethanol extracts of *Ferulago angulata* leaves”. Clinical Biochemistry, 44 (No.13 -Supplement) –S115
- 78) **Fallahi H**, Yarani R. **2010.** “Positional preferences by 20 amino acids in beta sheets”. 10th International Conference on Bioinformatics & Biomedicine, December 18-21, Hong Kong.
- 79) **Fallahi H**, Dokanehiifard S.A, Hosseini-Nasab S.M.E. **2010.** “Variation in positional preferences by 20 amino acids in alpha helices with different size”. 9th European Conference on Computational Biology, September 26-29, Ghent, Belgium.
- 80) Furbank R.T, Brill E, White R, **Fallahi H**, Ruan Y-L. **2009.** “Sucrose synthase: a crucial enzyme in secondary cell wall synthesis?”. Plant Biology congress (Annual meeting of ASPB), July 18-22, Hawaii, USA.
- 81) Badger M.R, Takahashi T, **Fallahi H**, Kaines S. **2009.** “Chlorophyll fluorescence screening of *Arabidopsis thaliana* for photorespiratory and photoinhibition mutants”. 1st International Plant Phenomics Symposium: from Gene to Form and Function, April 21-24 Canberra, Australia.



- 82) Furbank R.T, Sirault XRR, Estavillo G.M, **Fallahi H**, Pogson B. **2009**. “Non-invasive analyses of plant morphology and function: towards the creation of a phenotypic database”. 1st International Plant Phenomics Symposium: from Gene to Form and Function, April 21-24 Canberra, Australia.
- 83) **Fallahi H**, Scofield G.N, Badger M.R, Chow W.S, Furbank R.T, Ruan Y-L. **2007**. “Expression analysis of sucrose synthase (SUS) in developing seeds of Arabidopsis”. ComBio. September 22-26. Sydney, Australia.
- 84) Furbank R.T, **Fallahi H**, Badger M.R, Estavillo G.M, Pogson B, Lai I-L, Schurr U. **2007** “Imaging of Growth and Photosynthetic Performance for Arabidopsis thaliana functional genomics”. 14th International Congress on Photosynthesis, International Society for Photosynthesis Research, July 22-27 Glasgow, UK.
- 85) **Fallahi H**, Badger M.R, Chow W.S, Ruan Y-L, Furbank R.T. **2006**. “The impact of altering sucrose synthase activity on Arabidopsis thaliana”. 8th International Congress of Plant Molecular Biology. August 20-25, Adelaide, Australia.
- 86) **Fallahi H**, Zamani M.R, Motallebi M. **2002**. “Purification and characterization of polygalacturanase enzyme from *Ascochyta rabiei* isolates”. 15th Iranian Plant Protection Congress, September 7-11, Razi University, Kermanshah, IR. Iran.
- 87) Hosseinzadeh A, Zamani M.R, Motallebi M, **Fallahi H**. **2002**. “Study of DNA polymorphism among highly (HV) and weakly virulent (WV) isolates of *Ascochyta rabiei* using RAPD”. 15th Iranian Plant Protection Congress, September 7-11, Razi University, Kermanshah, IR. Iran.

