Curriculum Vitae

PERSONAL DETAILS

Full Name:	Elahe Mahmoodi Khaledi
Address:	Biotechnology Department, Faculty of Chemistry, University of Kashan, Kashan
Telephone:	(98-031) 559-130-42 (work)
E-mail:	e.mahmoodi_kh@kashanu.ac.ir
Date of birth:	18/03/1986
Place of birth:	Tehran
Nationality:	Iranian
Marital Status:	Married

EDUCATION AND QUALIFICATIONS

2009-2015	Ph.D. in Microbiology, University of Tehran, University College of Sciences, Faculty of Biology, Departments of <u>Microbiology</u> and <u>Molecular and Cellular Biology</u> , <u>Medical bacteriology</u> and <u>Protein Biotechnology</u> Labs., Teheran, Iran
2013-2014	Visiting Ph.D. student in Biochemistry/Microbiology, University of Granada, University College of Sciences, Faculty of Chemistry, Environmental, biochemical and nutritional analytical-Control research group, CIDAF, Granada, Spain
	Presented Ph.D. thesis in Microbiology under supervision of Dr. Habibi-Rezaei M. and Dr. Kashef N. "Survey of the antibacterial activity of different honey types against bacteria causing wound infections"
2007-2009	Master in Microbiology, University of Tehran, University College of Sciences, Faculty of Biology, Department of Microbiology, Teheran, Iran

Presented a thesis in Microbiology under supervision of Dr. Amoozegar M.A. "Diversity of extremely halophilic archaea producing extracellular hydrolytic enzymes isolated from Aran-o-Bidgol salt lake"

2003-2007 Bachelor in Science, Plant Biology, Shahid Beheshti University, University College of Sciences, Faculty of Biology, Department of Biology, Teheran, Iran

CERTIFICATES

May 2016	Essential oil extraction methods workshop in the first Iranian congress of essential oil organized by university of Kashan
May 2016	Quality control of essential oil workshop in the first Iranian congress of essential oil organized by university of Kashan
February 2015	Primer design training workshop in Tarbiat Modares University
August 2014	Advanced SPSS training workshop in Tarbiat Modares University
July 2014	Advanced article writing training workshop in Tarbiat Modares University
June 2013	12 th ICBC (International Conference on Biophysical Chemistry) congress, Tabriz, Iran
October 2012	Real-time PCR analysis software training workshop in Tarbiat Modares University
June 2012	11 th ICBC (International Conference on Biophysical Chemistry) congress, Ardabil, Iran
Jan 2012	Workshop in Information management software usage, "EndNote & EndNoteWeb"
December 2011	Teacher in Food fraud and its detection workshop, Zanjan, Iran

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July 2010	The second Iranian proteomics congress in Royan Institute
September 2010	4th International Conference of Biology, Mashhad, Iran
July 2009	3 rd FEMS congress, Gothenburg, Sweden
Jan 2008	UTEPT (University of Tehran English Proficiency Test)
April 2006	Proteomics workshop in Pasteur Institute of Iran (electronic [14 days] & practical [3days] coursework training entitled 'proteomics'')

TECHNICAL EXPERIENCES AND SKILLS

- Microbiological Skills
 - Microbiological general Skills
 - Bacterial isolation, culture and maintenance
 - Preparing different culture media
 - Different microscopic staining and observation
 - Bacterial biochemical identification
 - Bacterial molecular identification by 16srDNA gene amplification
 - Bacterial drug resistance studies
 - Various hydrolytic enzyme assay methods
 - Various anti-microbial assays
 - Agar overlay assay
 - o Time-kill assay
- Protein Biology Skills
 - Protein purification
 - Dialysis
 - Solvent/salt precipitation
 - Ultrafiltration
 - Gel filtration/Ion exchange chromatography
 - HPLC
 - Protein quantification (Bradford/OPA assays)
 - Native PAGE, SDS- PAGE and Tricine SDS-PAGE

- IEF and 2DE
- LC-MS, MS-MS
- Agar overlay assay
- Proteomics
- Molecular Biology Skills
 - Primer design
 - Software: Oligo Primer Analysis, DNASIS
 - o Genomic DNA extraction/ Quality and quantity evaluation
 - o Nested PCR
 - PCR product cloning in plasmid
 - Competent cell production
 - Transformation
 - Screening of transformed cell
 - Sequencing of vector gene
 - Expression of foreign gene
- Folin-Ciocalteu assay and Antioxidant activity of different compounds by:
 - o FRAP
 - o TEAC
 - o ORAC
 - Bioinformatics Skills and Knowledge:
 - Biological databases (PIR, Swiss-Prot, TrEMBL, NRL 3D and etc.)
 - Pair wise sequence alignments
 - Scoring matrices(PAM, BLOSUM)
 - Gap penalty
 - Comparison methods(Global alignment, Local alignment, Evaluation)
 - Dot Plot
 - Dynamic programming algorithm
 - Multiple sequence alignment(MSA)
 - Heuristic multiple sequence alignment: STAR, CLUSTALW
 - Sequence alignment vs. database
 - FASTA algorithm
 - BLAST algorithm and it's variations (BLASTN, BLASTN TRLASTN TRLASTN)
 - BLASTP, BLASTX, TBLASTN, TBLASTX)
 - Phylogenetic tree
 - Molecular phylogenetic tree building method
 - Character based methods:
 - Parsimony: maximum parsimony algorithm
 - Distance-based methods

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Distance matrix methods:

- 1. UPGMA method
- 2. Neighbor Joining(NJ) method
- 3. Fitch Margoliash (FM) method
- 4. Maximum likelihood(ML)
- Bootstrapping

Research Institutes and work places:

2016-present	Assistant professor in Microbiology, Kashan University, Faculty of Chemistry, <u>Departments of Biotechnology</u> , Kashan, Iran
2015	Executor and designer of research project as "Authenticity and Grading of honey based on Molecular criterion" in Institute of Standards and Industrial Research of Iran (ISIRI)
2014	Teacher in Biotechnology and Microbiology lectures and Labs, Kashan University (Part Time Job)
2013-2014	Visiting Ph.D. student in Biochemistry/Microbiology, University of Granada, University College of Sciences, Faculty of Chemistry, Environmental, biochemical and nutritional analytical-Control research group, CIDAF, Granada, Spain
2012-present	<u>Trainee</u> for HPLC and LC-MS in Analytical Chemistry Lab, Medicine Plant and Drugs Research Institute, Shahid Beheshti University, Tehran, Iran
2011-present	<u>Protein Biotechnologist/Researcher</u> as Ph.D. student in Tehran University, University College of Sciences, Faculty of Biology, Department of Molecular and Cellular Biology, Protein Biotechnology Lab., Teheran, Iran
2010-present	<u>Microbiologist/Researcher</u> as Ph.D. student in Tehran University, University College of Sciences, Faculty of Biology, Department of Microbiology, Medical Bacteriology Lab., Teheran, Iran
2010-2015	<u>Teacher in Biotechnology and Microbiology lectures and Labs,</u> Varamin Azad University (Part Time Job)
2010-present	<u>Test designer and adviser</u> in Tehran University Jihad (The center for volunteers prepare in the nationwide university entrance.

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2009 (summer)	Trainee in Imam Khomeini hospital Laboratory, Teheran, Iran.
2008-2009	<u>Microbiologist/Researcher</u> as Master student in Tehran University, University College of Sciences, Faculty of Biology, Department of Microbiology, Teheran, Iran.
2007 (1 month)	Biotechnologist/research assistant in National Institute of Genetic Engineering and Biotechnology (NIGEB), Tehran, Iran
2007 (2 months)	<u>Research assistant</u> in Iranian Research Institute of Plant Protection, Tehran, Iran

MEMBERSHIP

- Permanent member of the Iranian Proteomics Society (IPS)
- Permanent member of the Iranian Biology Society
- Permanent member of the Iranian Society Of Biophysical Chemistry (ISOBC)
- o Executive board member of the international congress of Microbiology
- Graduates Society member of the National Organization for Development of Bright Talents (SAMPAD in Persian)

AWARDS

- May 2017 Election as <u>university educational worthy professor</u> in 1395, Kashan university
- March 2016 Second rank of fundamental research, The 29th Khwarizmi International Award, Iranian Research Organization for Science and Technology

PUBLICATIONS

- Mahmoodi-Khaledi, E., Lozano-Sánchez, J., Bakhouche, A. et al. (2017). Physicochemical properties and biological activities of honeys from different geographical and botanical origins in Iran. *Eur Food Res Technol.* 243(6): 1019-1030.
- Habibi-Rezaei, M., Mahmoodi-Khaledi, E., Moosavi- Movahedi, AA. (2015). Honey as Nutraceutical. *Science cultivation*. **5**(2): 3-10.

- Mahmoodi-Khaledi, E., Kashef, N., Habibi-Rezaei, M., Moosavi- Movahedi, AA. (2015). In vitro characterization of antibacterial potential of Iranian honey samples against wound bacteria. *Eur Food Res Technol.* 241(3): 329–339.
- Mahmoodi Khaledi, E., Sharifat Salmani, A. *General of Microbiology*. Modaresan Sharif publication, 2012. (Book in persian)
- Sharifat Salmani., Mahmoodi Khaledi, E, A. *The collection of Mycology, Virology and Immunology*. Modaresan Sharif publication, 2012. (Book in persian)
- Mahmoodi Khaledi, E., Sharifat Salmani, A. *The collection of questions in Biology exams*. Modaresan Sharif publication, 2011. (Book in persian)
- Makhdoumi Kakhki, A.; Amoozegar, M. A.; Mahmodi Khaledi, E., (2011). Diversity of hydrolytic enzymes in haloarchaeal strains isolated from salt lake. *Int. J. Environ. Sci. Tech.*, 8 (4): 705-714.
- Naraghi, L., A. Heydari, et al. (2010). "Biological Control of Tomato Verticillium Wilt Disease by *Talaromyces Flavus*." *Journal of Plant Protection Research* 50(3): 360-365.

PRESENTATIONS

- Leyva Jimenez, FJ., Lozano-Sánchez, J., Mahmoodi-Khaledi, E., Segura-Carretero, A. Antimicrobial potential of phenolic fraction in Iranian honeys. Potential ingredient for development of nutraceutical products. 5th international conference on food digestion 4-6 April, 2017, Rennes - France
- Mahmoodi-Khaledi, E., Habibi-Rezaei, M., Moosavi- Movahedi, AA. A clue to find the new antimicrobial peptides in Iranian honeys. *The 17th International and Iranian Congress of Microbiology 23-25 August, 2016, Tehran Iran*
- Mahmoodi-Khaledi, E., Habibi-Rezaei, M., Moosavi- Movahedi, AA. Is hydrogen peroxide a considerable antimicrobial agent of all honey types? *The* 17th International and Iranian Congress of Microbiology 23-25 August, 2016, Tehran – Iran
- Mahmoodi-Khaledi, E., Habibi-Rezaei, M., Kashef, N., Ghasempour, A., Moosavi- Movahedi, AA. Isolation of antibacterial fractions from Iranian honeys by HPLC. 1st Tabriz International Life Science Conference & 12th Iran Biophysical Chemistry Conference (TILSC & IBCC) 22-24 May, 2013, Tabriz, Iran
- Mahmoodi-Khaledi, E., Sadeghian, E., Habibi-Rezaei, M., Kashef, N. The physicochemical and biochemical survey of the honey types from Iran: Protein and Enzyme profiling. *The first ICBC congress 2012, June 13-15, Iran*

- Mahmoodi Khaledi, E., Amoozegar, M.A., Study of hydrolytic exoenzymes production in extreme halophile archaea from Aran-Bidgol salt lake. *The 4th International Conference of Biology 2010, September 14-16, Iran.*
- Mohammad Ali Amoozegar, Elahe Mahmoodi, Diversity of halophilic archaea producing extracellular hydrolytic enzymes isolated from Aran-Bidgol salt lake. *The 3th FEMS congress 2009, 27 Jun-2 July, Sweden.*