## Ja'far Hemmat's CV

## PERSONAL INFORMATION

First name: JafarLast name: HemmatStatus: MarriedNationality: IranianLanguage: Persian, English

D.O.B: 14 May 1971 Academic title: Faculty Sex: Male

## **EDUCATION AND QUALIFICATION**

B .Sc. BIOLOGY- Microbiology, 1994, Microbiology Department, Faculty of Sciences, Tehran University, Iran.

M Sc, BIOLOGY- Microbiology, 1998, Microbiology Department, Faculty of Science, Isfahan University. Iran.

PhD of Molecular Genetics, 2011, Industrial & Environmental Biotechnology Department, National Institute of Gene Engineering and Biotechnology (NIGEB/NRCGEB) & Medical University of Tehran, Iran.( With Scholarship of The Ministry of Science, Research and Technology ).

### **Appointments**

**1**. Manager of Productivity Committee of Iranian Research Organization for Science and Technology (IROST)–Yazd center. 16 Oct 1999.

2. Responsible to Establish the Biotechnology Department of Iranian Research Organization for Science and Technology (IROST) – Yazd center. 1999-2003

 Academic Staff in Biotechnology Department of IROST –Yazd center. 11 Jun 1999.
Selected as Top Employee in Iranian Research Organization for Science and Technology (IROST) –Yazd center (1999& 2000).

5. Member of Scientific Committee of Iranian Research Organization for Science and Technology (IROST) – Yazd center. 22 Nov 2000.

6. Logistic Vice President of Iranian Research Organization for Science and Technology (IROST). ) – Yazd center. 22 Nov 2001.

7. Member of Professional Committee of Biotechnology of Iranian Research Organization for Science and Technology (IROST). 7 Jun 2002.

 Responsible to Establish the Technological Incubators of Yazd Science and Technology Park (YSTP-Member of IASP).10 Apr 2003.
Technical Manager of Yazd Science and Technology Park (YSTP-Member of IASP).2 Jun. 2004-2005.

10. Member of Primary/Technical and Final Committees of compiling of National Standards 8035-1 & 8035-2. Institute of Standards and Industrial Research of Iran (ISIRI). 2004-2005.

11. Academic Staff. Biotechnology Department of Iranian Research Organization for Science and Technology (IROST). March 2005-

12. Referee of Khwarizmi International and Young Award.2005-

13. Member of Commercialization Committee of Iranian Society of Biotechnology (ISB).Sept. 2006.

14. Vice President of Biotechnology Department of IROST. 2012-14.

15. Head of Industrial and Environmental Biotechnology Group, of IROST, 2015-

16. Director-in-Charge of Journal of Advanced Research in Microbial Metabolites & Technology (ARMMT), IROST. 2016-

17. Consultant of president of IROST, 2016.

# **RESEARCH PROJECTS**

-Isolation of Cellulolytic Bacteria from Silkworm's Digestive Tract and Evaluation of Their Application in Industry, 1998. (M.Sc. thesis).

- Evaluation of Production of a Multifunctional Biofertilizer. 2001-2002. Biotechnology Department of Iranian Research Organization for Science and Technology (IROST)-Yazd Center. Research Director.

-Production of a Multienzyme as Feed Additive. 2002-2004. Biotechnology Department of Iranian Research Organization for Science and Technology (IROST)-Yazd Center Research Director.

-Study of Distribution And Characterization of Non-LTR Retrotransposons in The Human Coagulation VIII Factor Gene, 2008. NIGEB.

-Expression of HCV Core Antigen and Evaluation of Its Ligand Designing. , 2007-10. PhD Thesis. NIGEB

-Study and selection of strains producing Thrmostable cellulose. IROST, 2014, Research Director.

-Production of thermostable Cellulase for Industrial Applications- Isolation and molecular detection of the isolates. 2015. Research Director.

-Monitoring and identification of the GMOs of imported fruits, 2015, Co-Investigator.

- Risk assessment guideline for genetically modified organisms based on act 4 of biosafety law of I.R. of Iran (in progress). Co-Investigator.

-Identification of Intronic regulatory elements of the human coagulation factor VIII gene as immune privilege motifs for hemophilia gene therapy, Eastern Mediterranean Health Genomics and biotechnology Network (EMGEN), (in progress).

# - <u>Interests</u>

Microbial biocatalysts- Extremophiles.

- Recombinant proteins Protein Engineering
- GMO Survey

#### **PUBLICATIONS**

Hemmat, J. Y. B., Khajeh, K. H., Moosavi-Movahedi, A. A., & Karkhane, A. A. (2011). Over-expression of full-length core protein of hepatitis C virus by Escherichia coli cultivated in stirred tank fermentor. *Iran J Biotechnol*, *9*, 245-252.

Karkhane, A. A., Yakhchali, B., Rastgar Jazii, F., Hemmat, J., Shariati, P., Khodabandeh, M., & Zomorodipoor, A. (2012). Periplasmic expression of Bacillus thermocatenulatus lipase in Escherichia coli in presence of different signal sequences. *Iranian Journal of Biotechnology*, *10*, 255-262.

Hashemi, T., Hemmat, J., & Sadeghifard, N. (2014). STUDY OF THE ABILITY OF BIOFILM FORMATION OF ISOLATED KLEBSIELLA FROM TWO GEOGRAPHIC REGIONS OF Iran. *Iranian Journal of Public Health*, *43*(2), 178.

Hesari, M. H., Hemmat, J., & Sadegifard, N. (2014). THE ANTIBIOTIC RESISTANCE OF KLEBSIELLA PNEUMONIAE STRAINS ISOLATED FROM URINARY TRACT INFECTIONS OF SHIRVAN CITY-NORTH KHORASAN IN 1392. *Iranian Journal of Public Health*, *43*(2), 96.

Hemmat, J., & MazaheriAssadi, M. (2013). Optimization of Reactive Blue 19 Biodegradation by Phanerochaetechrysosporium. *International Journal of Environmental Research*, *7*(4), 957-962.

Hesari, M. H., Hemmat, J., & Sadegifard, N. (2014). THE ANTIBIOTIC RESISTANCE OF KLEBSIELLA PNEUMONIAE STRAINS ISOLATED FROM URINARY TRACT INFECTIONS OF SHIRVAN CITY-NORTH KHORASAN IN 1392. *Iranian Journal of Public Health*, *43*(2), 96.

Azizi, M., Hemmat, J., Seifati, S. M., Torktaz, I., & Karimi, S. (2015). Characterization of a thermostable endoglucanase produced by Isoptericola variabilis sp. IDAH9. *Brazilian Journal of Microbiology*, *46*(4), 1225-1234.

Hashemi, T., & Hemat, J. (2016). Isolation of Klebsiella Species form Urinary Tract Infections and Study of Frequency of those LuxS Gene. *www. sjimu. medilam. ac. ir*, *23*(6), 20-28.

Shafiee M; Hemmat J, Sam M R (2016) Evaluation antibacterial activity of acetone extract of Glypholecia scabra and Rhizoplaca melanophthalm on some standard bacteria. *Biological Journal of Microorganism* 5(19),127-136.

Hashemi, T., Sadeghifard, N & Hemmat, J., 2016. Isolation of Klebsiella Species form Urinary Tract Infections and Study of Frequency of those LuxS Gene .sjimu 2016, 23(6): 20-28.

Farmanbar, N., Haddad-Mashadrizeh, A., & Hemmat, J. (2017). An in-silico investigation on the structure, function and homologous sequences of the enzymes and proteins involved in the production and accumulation of the lipids in biodiesel resources, *Biological Journal of Microorganism* 6(22), 59-76.

Bambaei, B.,, Hemmat, J., Karkhane, A, A., & Torktaz, I. (2017). In Silico Optimization of Formate Formation by Acetobacteriumium woodii's formate Dehydrogenase. Int J cell Sci & mol biol 1(3): IJCSMB.MS.ID.555564 (2017)

F. Hajmohammadi, Z. Soleimani, J. Hemmat, N. Kazemimejad, AR. Sedrpoushan, M. Ranjbar, M. Heydari, A. ParachStudies of antibacterial effects of synthesized silver nanoparticles using a novel thermotolerant Isoptericola variabilis sp. IRSH1 against Staphylococcus aureus and Pseudomonas aeruginosa. J Qazvin Univ Med Sci 2017, 21(3): 30-23.

#### **TEACHING**

- 1. Environmental Microbiology. Biology BSc. Payam-e-Nour University. Jan 2000-2004.
- 2. General Microbiology. Biology BSc. Payam-e-Nour University. Jan 2000-2004.
- 3. Laboratory of General Microbiology. Biology BSc. Payam-e-Nour University. Jan 2001-2004.
- 4. Virology. Biology BSc. Payam-e-Nour University. Jan. 2000-2004.
- 5. Biochemistry .Gynecology. Azad University -Maybod Unit. Jan 2002.
- 6. Eukaryotic Genetic. Tehran University. 2011.
- 7. Microbial Biotechnology. MSc. IROST. 2012-

- 8. Industrial Microbiology. MSc. IROST.2012.
- 9. Gene Engineering. PhD. IROST.2012
- 10. Metabolic Engineering. PhD. IROST. 2013.
- 11. Genetic of Microorganisms. IROST.2013-

## WORKSHOPS & TRAINING

1. Working with laboratorial Animals and Virology. Institute Pasture of Iran. Jul-Aug 1993(Two weeks).

2. Protein Sequencing. Research Institute of Biochemistry and Biophysics (I.B.B.) of Tehran University. Nov 1993.

3. Transmision and Scanning Electron Microscopes (TEM & SEM).TEM & SEM Department of Medical University of Isfahan. Jun\_Jul. 1998(Six weeks).

4. Application of Biotechnology in Waste Management. (International Workshop) IROST & APCTT. Isfahan. Iran. Nov 4-6. 2000.

5. Protein Purification in Downstream Process. Medical Biotechnology Network. Institute Pasture of Iran. Dec 2002.

6. Impedance Microbiology. Sylab Company. Tehran, Dec 2003.

7. Cloning and Expression of HGH in E.Coli. NRCGEB. 2005 .

8. Genome Workbench and SeqVista. NRCGEB/NCBI. 24 May2006 .

9. Management Citation. NRCGEB. 11-12 Sep 2006 .

10. Detection of Avian Influenza Virus by RT-PCR. NIGEB/ Institute for Research and Planning in Higher Education(IRPHE). 11-13. Nov 2006.

11 Introduction to Advanced Molecular, Cytogenetic & Molecular Cytogenetic Techniques. NIGEB/ Institute for Research and Planning in Higher Education (IRPHE). 19-22 Nov 2006.

12. Application of Bioinformatics in Molecular Biology. NIGEB/ Institute for Research and Planning in Higher Education(IRPHE).16-19 Dec 2006.

13. Expression, Production of Assay of Enzyme for Biotechnological Purposes. NIGEB/ Institute for Research and Planning in Higher Education(IRPHE).23-26 Dec 2006.

- 14. Commercilazation of Research Results in Biotechnology.NIGEB. 25 Dec 2006.
- 16. Rulles, Rights of Inventors and Biotechnology Improvement. NIGEB. 9 May 2007.
- 17. Quality Control in Biotechnology Products. NIGEB. 18 Jul 2007.
- 18. Phylogenetic Tree (softwares). NIGEB. 1-3 Nov 2010.
- 19. Roadmap of Biotechnology in Iran. Part A. Irost. 2010
- 20. Roadmap of Biotechnology in Iran. Part B. Irost. 2011.

### AwardS

1. Selected as Top Employee in Iranian Research Organization for Science and Technology (IROST) – Yazd center (1999& 2000).

- 2. Scholarship of the Ministry of Science, Researh and Technology for PhD. Education. 2005.
- 3. Selected as Top Resercher in Yazd Providence. 2011.

### WORKSHOPS & SEMINARS DIRECTION

- 1. Quality Control in Microbiology Laboratory. Yazd\_ IROST& Iranian Blood Transferring Organization. 22 May-22Jun 2001.
- 2. Basic Techniques of Microbial Biotechnology. Biotechnology Department of IROST. 24 Apr 2001.
- 3. 3th Congress of Managers & Presidents of Technology Parks & Technology Incubators. 2004.

3. Applications of Environmental Friendly Technologies (Coordinator). YSTP and the International Representative and Coordinator of Ecocentrum (Sweden).11 Mar 2005.

4. Director of 2th Workshop of Commercialization of Research Projects-Results: Making Fortune. Iranian research Organization for Science and Technology.IROST & Iranian Society of Biotechnology (ISB). May 2007.

5. Scientific Coworker of Workshop on Quality Control of Biotechnology Products. National Institute of Genetic Engineering and Biotechnology. June. 2007.

6. Codirector of Biotechnology Bazaar. 5th National Congress of Biotechnology of Iran. Tehran, 2007.

#### Establishment of Centers &

- 1. Student's Research group of Immunology. Biology Department .Tehran University.1993
- 2. Research Building Of IROST- Yazd Center.2001(vice present)
- 3. Biotechnology Department Of IROST- Yazd Branch.2001.
- 4. Biotechnology Incubator-Yazd Science and Technology Park (Coworker). 2003.
- 5. Technology Incubator of Abarkooh.2004.

6. Journal of Advanced Research in Microbial Metabolites & Technology (ARMMT), IROST. 2016.

#### **ADDRESS**

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