Majid Yousefikhoshbakht

Curriculum Vitae

Personal Information

Gender	Male	**Email**	yousefikhoshbakht@gmail.com
Date Of Birth	May 25, 1982	**Home Phone**	+98 81 38230342
Marital Status	Married	**Cell Phone**	+98 9182601300
Address	189 Plaque, Saeedieh Avenue, Hamedan, Iran.		
Position	Assistant Professor, Department of Mathematics, Faculty of Sciences, Bu-Ali Sina University, Hamedan, Iran.		

Education

2010-2014	**Ph.D.** in Computer Science, Mathematics and Computer Science Department, **Amirkabir University of Technology (Tehran Polytechnic** www.aut.ac.ir **)**, Tehran, Iran. *Major: Applied Mathematics. GPA: 18.67/20.0.* *Thesis Title: Modeling and Development of Efficient Methods for the Approximate Solution for the Heterogeneous Fixed Fleet Open Vehicle Routing Problem.* *Graded 18.75/20.0.*
2005-2007	**M.S.** in Mathematics, Mathematics and Computer Science Department, **Amirkabir University of Technology (Tehran Polytechnic** www.aut.ac.ir **)**, Tehran, Iran. *Major: Applied Mathematics. GPA: 16.15/20.0.* *Thesis Title: Vehicle Routing Problem With Pickups and Deliveries.* *Graded 18.75/20.0.*
2001-2005	**B.Sc.** in Mathematics, Science Department, **Buali Sina University (**www.basu.ac.ir**)**, Hamedan, Iran. *Major: Pure Mathematics. GPA: 16.28/20.0.*
1997-2001	**Diploma in Mathematics and Physics**, Shahid Bahmani High School, Hamedan, Iran.

Research Interests

Traveling Salesman Problem	Application heuristic and metaheuristic methods in the traveling salesman problem and its extension.
Vehicle routing Problem	Modeling and using metaheuristic methods in the vehicle routing problem and its extension.
Dynamic Facility Location in Integrated Closed Chain Problem	Proposing exact and heuristic algorithm for this problem and its extensions.

Awards and Honors

Summer 2018	I won a full scholarship for a study opportunity during three months at the University of L'Aquila in Italy from Bu-Ali Sina University.

Winter 2012	I Won a full scholarship for a study opportunity during eight months at the Vrije University in Netherlands from Amirkabir University of Technology.
Spring 2010	I was selected **the second place** in the Ph.D Entrance Exam at Amirkabir University of Technology.
Spring 2005	I was **55th among 15000** competitors in the MS Entrance Exam.
Spring 2003	I Received the **Third Place** in Mathematic Olympiad throughout the Region 4 of country.

Teaching Experiences

Spring 2008 until now

▶ *Operation Research 1,2* undergraduate courses, Computer Basis, Computer Advanced, Basic Mathematics, Multi-objective optimization, Integer Programming, Bu-Ali Sina University, Hamedan, Iran.

▶ *Operation Research 1,2* undergraduate courses, Payam e Noor University of Nahavand and Bahar, Hamedan, Iran.

▶ *Numerical Analyziz 1,2* undergraduate courses, Payam e Noor University of Kabotar Ahang, Hamedan, Iran.

▶ *Computer Basics* undergraduate course, Payam e Noor University of Songhor, Hamedan, Iran.

Work Experiences

2015-2021	Assistant professor at Bu-Ali Sina University, Hamedan, Iran
2002-2005	Assistant of the computer site in the science laboratory, Buali Sina University, City, Iran.
2006-Now	One of the NORC (Network Optimization Research Center) Team Members (One of the NORC' project has been Bus Rapid Transit (BRT) Network Planning and implementing in Tehran http://www.norc.tashakkori.ir)

Publications

ISI papers

▶ YousefiKhoshbakht, M., Didehvar, F., Rahmati, F., "Solving the Heterogeneous Fixed Fleet Open Vehicle Routing Problem by a Combined Meta-heuristic Algorithm", International Journal of Production Research, Vol. 52, No. 9, 2014, pp. 2565-2575 (Impact factor=4.58, Q1)

▶ YousefiKhoshbakht, M., "Solving the Traveling Salesman Problem: A Modified Metaheuristic Algorithm", Complexity, 2021. pp. 1-13 (Impact Factor=2.46, Q2).

▶ Rahmani, A., Yousefikhoshbakht, M., "A Benders Decomposition Method for Dynamic Facility Location in Integrated Closed Chain Problem", Mathematical Problems in Engineering, 2021. pp. 1-14 (Impact Factor=1, Q3).

▶ YousefiKhoshbakht, M., Didehvar, F., Rahmati, F., "An Efficient Solution for the Vehicle Routing Problem by Using a Hybrid Elite Ant Colony Optimization", International Journal of Computers, Communications & Control, Vol. 9, No. 3, 2014, pp. 56-62 (Impact Factor= 2.09, Q2).

▶ YousefiKhoshbakht, M., Sedighpour, M., "A Combination of Sweep Algorithm and Elite Ant Colony Optimization for Solving the Multiple Traveling Salesman Problem", Proceedings of the Romanian Academy A, Vol 13, No. 4, 2012, pp. 295-302 (Impact factor=1.29, Q3).

▶ YousefiKhoshbakht, M., Sedighpour, M., "New Imperialist Competitive Algorithm to Solve

the Traveling Salesman Problem", International Journal of Computer Mathematics, Vol. 90, No. 7, 2013, 1495-1505(Impact factor=1.6, Q2).

▶ Rahmani, A., Yousefikhoshbakht, M., "Capacitated Facility Location Problem in random fuzzy environment: Using -cost minimization model under the Hurwicz criterion", Journal of Intelligent & Fuzzy Systems, Vol. 25, No. 4, 2013, pp. 953-964 (Impact factor=1.85, Q3).

▶ YousefiKhoshbakht, M., Didehvar, F., Rahmati, F., "An Effective Rank Based Ant System Algorithm for Solving the Balanced Vehicle Routing Problem", International Journal of Industrial Engineering Theory, Applications and Practice, Vol. 23, No. 1, 2016, pp. 330-341 (Impact Factor=0.39, Q2).

▶ YousefiKhoshbakht, M., Didehvar, F., Rahmati, F., "Modification of the Ant Colony Optimization for Solving the Multiple Traveling Salesman Problem", Romanian Journal of information science and technology, Vol. 16, No. 1, 2013, pp. 65–80 (Impact factor=0.49, Q4).

▶ Nakhaei, F., Irannajad, M., Yousefikhoshbakht, M., Simultaneous Optimization of Flotation Column Performance Using Genetic Evolutionary Algorithm, Physicochemical Problems of Mineral Processing, Vol. 52, No. 2, 2016, pp. 874-893 (Impact Factor=1.29, Q3).

▶ Sedighpour, M., Ahmadi, V., YousefiKhoshbakht, M., Didehvar, F., Rahmati, F., "Solving the Open Vehicle Routing Problem by a Hybrid Ant Colony Optimization", Kuwait Journal of Science, Vol. 41, No. 3, 2013, pp. 139-162 (Impact factor=0.52, Q3).

Some ISC papers ▶ Bassiri, P., YousefiKhoshbakht, M. and Khorram, E., A Hybrid Modified Meta-heuristic Algorithm for Solving the Traveling Salesman Problem, Journal of Industrial Engineering International, Vol. 6, No. 1, 2013, 58-70.

▶ YousefiKhoshbakht, M., Didehvar, F., Rahmati, F., "Optimization of Vehicle Routing Problem with Simultaneously Pickup and Delivery Using a Modified Tabu Search", Journal of Advances in Computer Research, Vol. 3, No. 4, 2012, pp. 55-66.

▶ Saadati Eskandari, Z., YousefiKhoshbakht, M., "Solving the Vehicle Routing Problem by an Effective Reactive Bone Route Algorithm", Transportation Research Journal, Vol. 1, 2012, pp. 51-67.

▶ Sedighpour, M., YousefiKhoshbakht, M. and Mahmoodi Darani, N., "An Effective Genetic Algorithm for Solving the Multiple Traveling Salesman Problem", Journal of optimization in Industrial Engineering, Vol. 4, no. 8, 2011, pp. 73-79 .

▶ YousefiKhoshbakht, M., Didehvar, F., Rahmati, F., A Mixed Integer Programming Formulation for the Heterogeneous Fixed Fleet Open Vehicle Routing Problem, Journal of optimization in Industrial Engineering, Vol. 8, No. 18, 2015, pp. 37-46.

▶ Ahmadvand, M., YousefiKhoshbakht, M., Mahmoodi Darani, N., "Solving the Traveling Salesman Problem by an Efficient Hybrid Metaheuristic Algorithm", Journal of Advances in Computer Research, Vol. 3, No. 3, 2012, pp. 75-84.

▶ YousefiKhoshbakht, M., Sedighpour, M., Mahmoodabadi, E., "A Modified Elite ACO Based Avoiding Premature Convergence for Traveling Salesman Problem", Journal of Industrial Engineering International, Vol. 7, No. 15, 2011, pp. 68-75.

▶ Mahmoodi Darani, N., Ahmadi V., Saadati Eskandari, Z., Yousefikhoshbakht, M., "Solving the Capacitated Clustering Problem by a Combined Meta-Heuristic Algorithm", Journal of Advances in Computer Research, Vol. 4, No. 1, 2013, pp. 89-100.

▶ Larki, H., Yousefikhoshbakht, M., Solving the Multiple Traveling Salesman Problem by A Novel Meta-heuristic Algorithm, Journal of optimization in Industrial Engineering, Vol. 6,

No. 16, 2014, pp. 55-63.

▶ Darani, N.M., Dolatnejad, A. and Yousefikhoshbakht, M., A reactive bone route algorithm for solving the traveling salesman problem. Journal of Industrial Engineering and Management Studies, Vol. 2, No. 2, 2015, pp.13-25.

▶ Darani, N. Mahmoodi, P. Bassiri, and M. Yousefikhoshbakht. "An Effective Algorithm in order to solve the Capacitated Clustering Problem", Journal of New Researches in Mathematics, 1(4), 2015, 81-102,

▶ Nakhaei, F. Irannajad, M. Yousefikhoshbakht, M. Flotation column performance optimisation based on imperialist competitive algorithm. International, Journal of Mining and Mineral Engineering, 7(1), 2016, 1-7.

▶ Yousefikhoshbakht, M. Dolatnejad, A. An Effective Ant Colony Algorithm for the Traveling Salesman Problem, Journal of Advances in Computer Research, 2016.

Some conference papers

▶ M. Yousefikhoshbakht, A meta-heuristic crow search algorithm for solving the open vehicle routing problem with time windows, Reliable Methods of Mathematical Modeling September 9–13, 2019 – TU Wien, pp. 50-51.

▶ M. Yousefikhoshbakht "Ant Colony Algorithm for Single Vehicle Routing Problem with Simultaneous Pickups and Deliveries," in *Proceedings of the 4th Seminar on Mathematics and Its Applications*. 17 May 2008, Islamic Azad University, Hamedan, pp.41-52. (In Persian)

▶ *S.M. Hashemi, M Yousefi Khoshbakht M.* "N-position Ant Colony Algorithm for Single Vehicle Routing Problem with Simultaneous Pickups and Deliveries," Extended Abstract *of First International Conference of Iranian Operations Research Society*, 28-30 January 2008, Kish University, Kish Island, Iran, (In Persian)

▶ *M. Yousefi Khoshbakht , A Zafari,."A New Ant Colony Algorithm for Solving Multiple Traveling Salesman Problem" The 2th Joint Congress on Intelligent and Fuzzy Systems (ISFS2008), 28-30 October, 2008, Malek-Ashtar University of Technology,Tehran, Iran (in persion)*

▶ *S.M. Hashemi, M Yousefi Khoshbakht, A., Zafari "Solving Multiple Traveling Salesman Problem by A modified Elite Ant Colony System," the 40th Annual Iranian Mathematics Conference (AIMC), 17-20 August 2009, Sharif University of Technology, Tehran, Iran, (In Persian)*

▶ *M. Yousefi Khoshbakht , A. Zafari, "A hybrid metaheuristic method for Solving vehicle routing problem ", The 6th International Industrial Engineering Conference Site, 18 - 19 February 2009, Sharif University, Tehran - Iran, (In persion)*

▶ *A., Mirzaee., M Yousefi Khoshbakht, "A Ant Colony Optimization for Timetabling and Graph Coloring," the 40th Annual Iranian Mathematics Conference (AIMC), 17-20 August 2009, Sharif University of Technology, Tehran, Iran, (In Persian)*

▶ *A. Zafari., M. Yousefi Khoshbakht, "Determining an upper bound for groups whose maximal subgroups are isomorphic ", The second International Conference of Iranian Operations Research Society , 14-15 May 2009, Payame Noor University (PNU), Babolsar - Iran, (In persion)*

▶ *M., Zahedi Keyvan, M.,Yousefi Khoshbakht " Determining Optimal Model of the Band Credit Assignment by Fuzzy Mathematical Fuzzy Mathematical Programming" The 3th Joint Congress on Intelligent and Fuzzy Systems (ISFS2008), 15-17 July, 2009, Yazd University ,Yazd, Iran (In persion)*

▶ *M. Yousefi Khoshbakht , A. Zafari, "Mixing Ant Colony Algorithm and Simulated Algorithm Based on Escaping from Local Optimum Points", The second International*

Conference of Iranian Operations Research Society , 20-22 May 2009, <u>Mazandaran University</u>, Babolsar - Iran, (In persion)

▶ *M. Zahedi Keyvan, M. Yousefi Khoshbakht, "A Effective Fuzzy Algorithm for Solving Credit Assignment Problem in Export Development Bank Of Iran", The second International Conference of Iranian Operations Research Society , 20-22 May 2009, <u>Mazandaran University</u>, Babolsar - Iran, (In persion)*

References

Farzad Didehvar, Assistant Professor.
Mathematics and Computer Science Department, Amirkabir University of Technology (Tehran Poly-technic).
PhD from IPM, Tehran, Iran.
Email: Didehvar@aut.ac.ir. *Homepage:* https://aut.ac.ir/cv/2125/Farzad%20Didehvar

Mehdi Dehghan, Professor.
Mathematics and Computer Science Department, Amirkabir University of Technology (Tehran Poly-technic).
PhD from Amirkabir University of Technology.
Email: dehghan@ce.aut.ac.ir, *Homepage:* https://aut.ac.ir/cv/2299/Mehdi%20Dehghan

Esmaile Khorram, Professor.
Mathematics and Computer Science Department, Amirkabir University of Technology (Tehran Poly-technic).
PhD from Bradford University-England.
Email: eskhor@aut.ac.ir , Homepage: https://aut.ac.ir/cv/2139/Esmaile%20Khorram