

CV

1. **Name Surname** : VAHID NOURANI
2. **Date of Birth** : 21.09.1975
3. **Title** : Professor
4. **State of Education** : PhD
5. **Current Institution** : Near East University,
University of Tabriz

Degree	Department	University	Date
Bachelor's Degree	Civil Engineering	University of Tabriz	1988
Master's Degree	Civil Engineering, Hydraulic Structures	University of Tabriz	2000
PhD	Civil Engineering, Hydrology	Shiraz University and Tohoku University	2026

5. Academic Appointments

- Assistant Professor (Date) : 2006
Associate Professor (Date) : 2010
Professor (Date) : 2014

6. Theses Advised (Master and PhD)

No	Full Name of Student	Level	Title of Thesis
1	Elnaz Sharghi	Ph.D.	Liquid Analog Model for laboratory simulation of
2	Alireza Babaian	Ph.D.(Sahand Univ.)	Numerical and experimental investigation of earthen dam breach
3	Taher Rajaei	Ph.D.(Khaje Nasir Univ.)	Artificial Intelligence approach for sediment modeling
4	Rezagoli Ejlali	Ph.D.	A hybrid black box model for quantity and quality modeling of groundwater
5	Mehdi Komasi	Ph.D.	Genetic programming-Wavelet conjunction model for rainfall-runoff modeling
6	Farzad Saidi	Ph.D.	Theoretical and experimental system identification of rainfall-runoff process
7	Amin Mohebi	M.Sc.	Gravity concrete dam shape optimization by ACO
8	Yusef Gafari	M.Sc.	Gravity concrete dam shape optimization by GA

9	Simin Shahradfar	M.Sc.	Optimal design of open channel section by heuristic approaches
10	Kamran Salehi	M.Sc.	Application of ANFIS and Wavelet to Rainfall-runoff modeling
11	Mojtaba Valipor	M.Sc.	Nonlinear modeling of rainfall-runoff in GIS environment
12	Elnaz Sharghi	M.Sc.	Sattarkhan earthen dam seepage analyze by ANN
13	Samira Rumianfar	M.Sc.	ARIMA-ANN hybrid modeling of rainfall-runoff
14	Vahid Sepehri	M.Sc.	Gorgnrood runoff analyze by GIS
15	Javad Khaiemohamadil	M.Sc.	Parameters estimation of Nash's model by GA
16	Mehdi Komasi	M.Sc.	A combined wavelet-ANN multivariate model for rainfall-runoff process
17	Leila Malekani	M.Sc.	Fuzzy logic approach for Ligvanchai watershed rainfall-runoff modeling
18	Hadi Delafroz	M.Sc.	Application of GIS tools for geomorphological rainfall-runoff modeling
19	Mehdi Kord	M.Sc.	A complex aquifer hydraulic parameters estimation by GA
20	Ahad Nourpor	M.Sc.	Investigation of water temperature effect on sediment load via ANN
21	Mohamad Soltannejad	M.Sc.	Evapotranspiration estimation of Ligvanchai watershed using ANN
22	Nima Sabokrohie	M.Sc.(Polytechnic Univ)	Amameh watershed runoff modeling by TOPMODEL in GIS
23	Rahim Karimzadeh	M.Sc.	Prediction of Ligvanchai watershed precipitation by Time series models
24	Naime Abolvaset	M.Sc.	Multi reservoir water resources management optimization GP
25	Omid Kalantari	M.Sc.	A geomorphological ANN model for watershed sediment forecasting
26	Arash Roghani	M.Sc.	TOPMODEL application for event based modeling of rainfall-runoff process
27	Mohamadreza Mosavi	M.Sc.	Using WMS for rainfall-runoff modeling
28	Frhad Tagizadeh	M.Sc.	Cokriging application to estimation permeability coefficient
29	Nazila Kardan	M.Sc.	Dam outlet optimization by GA
30	Mina Sayahfard	M.Sc.	Sensevity analysis of evapotranspiration parameters by ANN
31	Behnaz Amini	M.Sc.	Extraction of hysteresis curves of hydrological processes by ANN
32	Ehsan Entezari	M.Sc.	Using ANN and RBF methods for space-time modeling of rainfall
33	Mehdi Hajizadeh	M.Sc.	Non-linear cascade reservoirs model for rainfall-runoff simulation
34	Aida Hosseini Baghanam	M.Sc.	Conjunction of ANN, wavelet and SOM methods for precipitation modeling
35	Tohid Rezapour	M.Sc.	Entropy concept for ANN-based modeling of rainfall-runoff process
36	Masoumeh Parhizkar	M.Sc.	Application of clustering methods to select inputs of ANN model in rainfall-runoff modeling
37	Farzad Soumi	Ph.D.	left

38	Faege Nyazi	Ph.D.	development of geomorphologic rainfall-runoff models based on watershed landuse\cover changes and urbanization
39	Nasrin Nezamdost	M.Sc.	Trend analysis of runoff process by compounding Mann-Kendall's and discrete wavelet transform
40	Safa Mokhtaryan	M.Sc.	Effect of DEM Resolution in Extraction of Hydro-Geomorphologic Parameters
41	Maryam Khosravi	M.Sc.	Application of Wavelet Transform to Preprocess High Resolution DEM for Hydrological Applications
42	Aida Yahyavi	M.Sc.	Wavelet-based de-noising for ANN-based modeling of sediment load
43	Farzad Hassannejad	M.Sc.	Improvement of artificial neural network modeling for rivers streamflow forecasting based on wavelet denoising method
44	Masoud Mehrvand	M.Sc.	Multi Station and Multi Resolution Rainfall-Runoff Modeling via ANN
45	Navid Vakili	M.Sc.	Using geostatistical and neural network analysis of spatiotemporal forecasting of underground levels variations : case study in Tehran plain
46	Ahad Kashefye	M.Sc.	Implication of geostatistics tool to optimize position of boreholes
47	Gholamreza Andalib	M.Sc.	Sediment Load Estimation in the Ajichay Basin Stations Using Artificial Neural Networks and Support Vector Machines
48	Farhad alizadeh	M.Sc.	Spatial estimation of suspended sediment load of Ajichay basin
49	Sevil Ranjbar	M.Sc.	Change Detection Of Hydrological Processes Using
50	Faranak Totonchi	M.Sc.	Selection of the Robust Streamflow Forecasting Model Using Wavelet-Entropy Complexity Measure Case Study: Urmia Lake
51	Sadeg Vanda	M.Sc.	Application of ensemble clustering to improve ensemble forecasting of hydrological processes
52	Saleh Mohsenzadeh	M.Sc.	Application of PSIAC and modified PSIAC to estimate sediment yield of Aji-Chay basin via GIS"
53	Hamed Mollazadeh	M.Sc.	Application of time series ensemble clustering to improve forecasting of hydrological processes
54	Reza Zayerfar	M.Sc.	Rainfall-runoff modeling via integrated artificial neural networks
55	Reza Samadzadeh	M.Sc.	The Hydraulic Simulation of the Effects of New Dikes to Reduce the Evaporation Area; Case study: Urmia Lake, Iran
56	Reza Shahidi	M.Sc.	Spatial temporal estimation of Aji Chay rainfall stations by employing geostatistical tools
57	Saideh Hajizadeh	M.Sc.	Change-Point detection in hydrological time series, Case study : Urmia lake
58	Farzad Yusef poor	M.Sc.	Multivariate Optimization of Rain-gage Network using geostatistical methods (case study: Ajichay Basin)
59	Gholamreza Andalib	PhD	Watershed change detection using hybrid conceptual model-artificial intelligence
60	Shahram Mousavi	PhD	Simulation of contaminant transport in porous media using artificial intelligence-meshless interpolation hybrid model
61	Mehdi Golipour	PhD	
62	Afshin Partovian	PhD(Najaf Abad IAU)	Noise injection-denoising technique to improve artificial intelligence-based modeling of hydrological processes.

63	Masoud Parvan	M.Sc.	Investigation of overcoming and salinity of groundwater incoastal aquifers
64	Mahsa Gasemzadeh	M.Sc.	Investigating the effect of hydroclimatological parameters onUrmia lake water level
65	Narges Azad	M.Sc.	Assessment of Changes in Hydrological Processes Using HybridMann-Kendall and Wavelet Transform (Urmia Lake Watershed)
66	Elnaz Pezeshki	M.Sc.	ABSTRACT Estimation of unknown groundwater pumping rate using a
67	Amir Moulajo	M.Sc.	Applying The Data Mining Techniques to Forecast Long-TermHydro-Climatological Processes Using Sea Surface Temperature
68	Mahsa Jalali	M.Sc.	Aplication of artificial intelligence approach and remotly sensedimagery for soil moisture evaluation
69	Hessam Najafi	M.Sc.	Comparison of Different Seasonal Models For ForecastingHydrological Processes
70	Said Soleimani	M.Sc.	Catchment clustering based on hydro-climatological features
71	Reza Dashti	M.Sc.	Optimum Operation of Elevation Reservoir via Improved Harmony Search Algorithm
72	Farid Abbasi	Ph.D.	Development of distributed decision making model for smart water griddesign based on exchange mechanism
73	Vahab Naderi	Ph.D.	Fractal characterization of pore Self-compacting lightweight concrete containingsilica fume
74	Nima Farbodfam	Ph.D. (Roudhen	Time space rainfall time series disaggregation by AI-wavelet
75	Saber Sharifi	Ph.D. (Urmia Univ.)	Climatological impacts of large-scale sprinkler irrigation schemes.
76	Tohid Rezapour	PhD	left
77	Zahra Razagzadeh	M.Sc.	Application of feature extraction methods for AI-based investigation of climate change effects on hydro climatological parameters
78	Abi Rostamzadeh	M.Sc.	Longitudinal dispersion coefficient estimation of Ajichay and its pollution modeling affected by tannery industry
79	Behnam Sedagat	M.Sc.	Flow Routing Using Haar Wavelet Colocation Method
80	Saman Pourbayrami	M.Sc.	Using Multiple Linearization Conceptual Model and Artificial Neural Network (ANN) for Flow Routing
81	Armin Farshbaf	M.Sc.	Spatio-Temporal disaggregation of rainfall using rain-gauge and radar derived data
82	Ali Davanlo	M.Sc.	Hybrid Data Mining Models for Hydrological Forecasts Show original message

83	Faranak Kohansal	M.Sc.	Comparison of climate change impact on precipitation in Van and Urmia lakes in different scenarios of climate change
84	Parisa Asghaeri	M.Sc.	Using data processing tools to improve performance of AI-methods predicting effluent parameters from wastewater treatment plant
85	Ehsan Fromandi	M.Sc.	Eco-environmental quality evaluation using remotely sensed imagery and soft computing
86	Hessam Najafi	Ph.D.	
87	Mina Sayahfard	Ph.D.	
88	Sani I Abba	PhD (NEU)	Wastewater treatment plant performance analysis using artificial intelligence – an ensemble approach
89	Selin Uzelaltinbulat	PhD (NEU)	Spatiotemporal Precipitation Modeling by Artificial Intelligence Based Ensemble Approach
90	Jazulli Abdollahi	PhD (NEU)	Ensemble Modeling of Evapotranspiration

7. Publications

7.1. Articles published in internationally refereed journals (SCI,SSCI,Arts and Humanities)

No.	Title of Paper	Authors	Place of Publication	Date of Publication
1	Suspended Sediment Load Estimation Using Geostatistics, Case Study: Talkherood River of Tabriz(in Farsi)-	Nourani,V.,Bidokhti,N.T, Abedini,M.,J., Rakhshanderoo,G.R.	Iran Water Res. Research Journal	2005 Vol. 1(2)
2	Application of Liquid Analog Model for Hydrology Education; 1: Rainfall-Runoff Modeling (in Farsi)	Nourani,V.,Hassanzadeh, Y., Monadjemi,P.	J. Tabriz Univ. Faculty of Eng	2006 Vol. 32 (3)
3	Estimation of hydraulic parameters of confined aquifers using Genetic Algorithm optimization technique(in Farsi)	Mogaddam,A, Nourani,V.,Kord,M.	Iran Water Res. Research Journal	2008 Vol. 3(3)
4	Modeling of Tabriz plain rainfall using ANNs (in Farsi)	Mogaddam,A, Nourani,V.,Nadiri,A.O.	J. Agric. Sci.	2008 Vol.18(1)

5	Ann potential in multi-station modeling of suspended load in comparison with sediment rating curve method	Alami,M.T. , Nourani , V. ,Nazmara , H.	J. Agric. Sci.	2009 Vol.19(2)
6	Estimation of hydraulic parameters of Unconfined aquifers using Genetic Algorithm optimization technique(in Farsi)	Mogaddam,A, Nourani,V.,Kord,M.	Water and Wastewater Journal	2009 Vol.5(1)
7	Neural-Kriging model for time-space modeling of groundwater	Mogaddam , A.A. , Nourani,V., Nadiri , A.O.	Iran Water Res. Research Journal	2009 Vol.5(1)
8	A geomorphological unit hydrograph based on liner reservoir	Nourani, V., Alami,M.T. ,Delafrouz , H. , Sepehri , V.	Iran Water Res. Research Journal	2009 Vol. 4(3)
9	Artificial neural networks application to sensitivity analysis of effective parameters on suspended sediment load; case study: Ligvanchay River	Aminfar,M.H.,Nourani,V. ,Nourpor,A.	J. Civil & Env. Eng.,Tabriz Univ.	2009 Vol.39(2)
10	Rainfall-runoff modeling by ANFIS and ANN approaches	Nourani, V. Keynejad, M.A. Malekani, L.	J. Civil & Env. Eng.,Tabriz Univ.	2010 Vol. 34(4)
11	Peak discharge estimation of dam breach by ANN	Nourani,V. Hakimzadeh, H. Babaian, A.,R.	J. Civil & Env. Eng.,Tabriz Univ.	2011 Vol.40(3)
12	Cokriging application to estimation permeability coefficient	Moradi, Gh. Nourani,V. Taghizadeh, F.	J. Civil & Env. Eng.,Tabriz Univ.	2012 Vol.42(3)
13	Application of GA to optimize dam outlet	Nourani, V. Keynejad,M.A. Kardan, N.	J. Civil & Env. Eng.,Tabriz Univ.	2011 Vol.40(3)
14	A hybrid Goal Programming method and ANFIS for Optimal Operation of a Multi-Objective Two-Reservoir Systems	Nourani,V., Abolcvast,N., Salehi, K.	Iran Water Res. Research Journal	2013 Vol.8(2)
15	Drought forecasting by SPI via ANFIS	Komasi,M. Alami,M.T. Nourani,V.	Water and Wastewater Journal	2013 Vol.24(88)
16	Inputs sensitivy analysis of ANN for evapotranspiration forecasting	Nourani.V. Sayah Fard,M.	Water and Wastewater Journal	2013 Vol.24(87)

17	Land use impact on parameters of Nash's conceptual rainfall-runoff model	Fakherifard, Ah. Nourani, V. Nyazi, F	Irrigation and Water Eng. Journal	2015 Vol.5(9)
18	Change Detection of Hydrological Processes Using Wavelet-Entropy Complexity Measure	Nourani, V. Ranjbar, S. Tootonchi, F.	J. Civil & Env. Eng., Tabriz Univ.	2015 Vol. 45(3)
19	Spatial clustering for ANFIS based groundwater quality modeling	Aalmai, M.T. Nourani, V. Daneshvar, F.	Water and Wastewater Journal	2016 Vol.27(3)
20	Dam-Break Flood Waves Analysis and the Floodplain Mapping Using Mathematical Model (Case Study: Vanyar Dam)	Hassanzadeh, Y., Nourani, V. Sepehri, V. Delafrouz, H Hassanzadeh, M. Almaspour, F	Soil and Water Sci. Journal	2015 Vol.25(4)
21	Sediment Management by Multi-objective Operation of Sefidrud Dam with Respect to Hydropower Generation and Environmental Issues	Hajjabadi, R. Zarghami, M. Nourani, V.	J. Civil & Env. Eng., Tabriz Univ.	2016 Vol. 46(1)
22	Investigation of land use effects in geomorphological unit hydrograph of linear reservoirs	Fakherifard, Ah. Nourani, V. Nyazi, F	Water and Soil Journal	2016 Vol. 30(2)
23	Improvement of ANN-based river flow modeling using wavelet (Case Study: Gamasyab River)	Solgi, A. Radmanesh, H Zarei, H. Nourani, V.	Water Research Journal	2016 Accepted
24	Investigation of effect of hydrometeorological parameters of Ajichai on Urmia Lake's water level using Man-Kandall wavelet	Nourani, V. Azad, N. Ghasemzadeh, M. Sharghi, E.	Hydrogeomorphology Journal	2016 Vol. 2(7)
25	Improvement of AI-based rainfall-runoff models via noise jittering method	Partovian, A. Nourani, V.	Water Resources Eng.	2018 Vol.11(36)

		Alami,M.T.		
26	Investigation of dominant effects on the groundwater level recession using wavelet-entropy criterion	Komasi,M. Sharghi,S. Nourani, V.	Hydrogeomorphology Journal	2016 Vol.3(9)
27	Evaluation of Differential Evolution Algorithm in Optimum Operating of Elevation Single-Reservoir Dam System	Dashti,R. Sattari,M.T. Nourani,V.	J Water and Soil Resources Conservation	2017 Vol.6(3)
28	Using the Association Rules to Forecast the Maximum Monthly Precipitation of Tabriz Synoptic Station	Moulajo,A. Nourani,V., Sattari,M.T.	J of Civil and Env. Researchs	2016 Vol.2(1)
29	The Hydraulic Simulation of the Effects of New Dikes to Reduce the Evaporation Area; Case study: Urmia Lake, Iran	Samadzadeh Fahim, R. Zarghami,M. Nourani,V.	Iran Water Res. Research Journal	2018 Vol. 14(2)
30	Evaluating the uncertainties in the semi-rigidity of connections of the pier base to optimization of finite element model updating	M. Gholipour Feizi, V. Nourani, A. Mojtahedi, M. Barghian	Modares Mechanical Engineering	2016 Vol.16(12)
31	Noise effect on prediction of flow in porous media via ANN	Mousavi., Sh Nourani,V. Alami,M.T.	Journal of Environmental Science and Technology	2019 Vol.21(5)
32	A robust finite element model updating method for pier's structure with uncertainties in connections using particle swarm optimization algorithm	M. Gholipour Feizi, A. Mojtahedi, V. Nourani, M. Barghian	Journal of Structural and Construction Engineering	2017 Vol.4(1)
33	A Hybrid Decision Tree/Association Rules Approach for Long-Term Precipitation Forecasting	Nourani,V. Sattari,M.T. Moulajo,A.	Journal of Water and Irrigation Management	2017 Vol. 6(2)
34	Investigating Chloride concentration of groundwater by AI-wavelet coherency method	Mousavi,Sh. Nourani,V. Alami,M.T.	Civil Eng. J (Tarbat Modares Univ.)	2018 Vol.(17)

35	Investigating the Effect of Hydroclimatological Parameters on Trend in Variance of Water Level Fluctuations Using Wavelet Transform, (Case Study: Urmia Lake)	Ghasemzadeh,M. Nourani,V. Sharghi,E.	Water and Soil Science Journal	2019 Vol. 28(3)
36	Hydroclimatic Phenomena Modeling Using Wavelet-Holtwinters Model	Nourani,V. Sharghi,E. Najafi,H.	Iran Water Res. Research Journal	2018 Vol. 14
37	Spatial-temporal disaggregation of rainfall time series using wavelet-artificial neural network hybrid model	Farbodfam,N Nourani,V. Aminnejad,B.	Iran Water Res. Journal	2019 Vo. 14
38	Multi-station nitrate prediction via artificial intelligence and soft computing tools	Sharghi,E. Nourani,V. Andalib,G	J. Civil & Env. Eng.,Tabriz Univ.	2018 Vol.47(4)
39	Monthly sediment load prediction for Ajichai River via MPSIAC and cascade models	Nourani,V. Mohsenzadeh,S.	Hydrogeomorphology Journal	2017 Vol 3(11)
40	Assessment of Geotechnical Parameters Uncertainties in Analysis of New Tunnel Construction influence on the Existing Tunnel at their Non-Level Intersection	Tajdid,M. Ranjbarnia,M. Nourani,V.	Amirkabir Journal of Civil Engineering	2019 Vol. 51(4)
41	Assesment and application of ensemble AI models for pizometric head prediction of earth dams	Sharghi,E. Nourani,V. Behfar,N.	Iran Water Res. Journal	2019 Vo. 14
42	Assesment of denoiseing and jittering in AI modeling Mahabad River discharge	Partovyan,A. Nourani,A.	Journal of Environmental Science and Technology	2018 Published online
43	Application of MI basd feature extraction method for GCM downscaling of Tabriz rainfall	Razagzadeh,Z. Nourani,V. Hosseini baghanam,A.	Journal of Environmental Science and Technology	2020 Published online
44	Evaluation of earth dam overtopping risk by system dynamics, Monte-Carlo simulation and Latin Hypercube Sampling methods (case study: Hajilarchay Dam, Iran)	Ebrahimzadeh,A. Zarghami,M. Nourani,V.	Iran Water Res. Journal	2019 Vol. 15

45	Hybrid Wavelet-M5 Modeling in Rainfall-Runoff Process Forecast	Tajbakhsh,A.D, Nourani,V. Moulajo,A.	Iran Water Res. Journal	2019 Vol.15(2)
46	Feature extraction and statistical downscaling methods for ensemble AI modeling	Razagzadeh,Z. Nourani,V. Behfar,N.	Amirkabir Journal of Civil Engineering	2020 Vol.51(6)
47	Evaluation of wavelet – least square support vector machine hybrid model to rainfall time series spatiotemporal disaggregation	Farbodfam,N. Nourani,V. Aminnejad,B.	J. Water and Soil Res. Cons.	2019 Vol. 8
48	Application of optimization learning algorithms for dam reservoir operation due to environmental issues	Dashti,R. Sattari,M.T. Nourani,V. Feizi,H.	Journal of Environmental Science and Technology	2018 accepted
49	Eco-environmental Quality Evaluation Using Remote Sensing and Artificial Neural Networks (Case Study: Tabriz-Rasht)	Nourani,V. Foroumandi,E. Sharghi,E.	Iran Water Res. Journal	2019 Vol.15(3)
50	Estimation of prediction interval in ANN-based GCM downscaling	Sharghi,E. Nourani,V. Jabbarian,N.	Iran Water Res. Journal	2019 Vol.15
51	Investigation of Artificial Intelligence Approaches Capability in Predicting the WasteWater Treatment Plant Performance (Case Study: Tabriz WasteWater Treatment Plant)	M.T. Alami, N. Hejabi, V. Nourani M. Sagebyan	Amirkabir Journal of Civil Engineering	2019 Published online
52	Investigation and trend identification of groundwater level variations using discrete wavelet transform and non-parametric tests (case study: Azarshahr plain)	Kumars Roushangar, Vahid Nourani , Mehri Dolatshahi	Iran Water Res. Journal	2020 Vol.16(1)
53	Overtopin risk management of Hajilarchay Dam using Monte-carlo simulation and system dynamics	Ebrahimzadeh,A. Zarghami,M. Nourani,V.	Water and Irrigation Management	2020 Vol. 9(2)

54	Implementation of Data Jittering Technique for Seepage Analysis of Earth fill Dam Using Ensemble of AI Models	Sharghi,E. Nourani,V. Behfar,N.	Water and Soil Science	2020 Vol 30(1)
55	Investigating the Effect of Gold Mining on Land-Cover Trend at PixelScale Using a Combination of Remote Sensing Data and Mann-Kendall Test in Northwestern Iran Case Study: Andaryan Region, East Azerbaija	Andaryzni,S. Nourani,V.	Hydrogeomorp hology Journal	2020 Vol.6
56	Using ensemble model to improve ANN, ANFIS, SVR models performance in predicting wastewater treatment effluent BOD and COD parameters	Asghari,P. Nourani,V. Sharghi,E. Behfar,N.	Amirkabir Journal of Civil Engineering	2021 Vol. 53
57	Evaluation of the Capability of Intelligent Models in Estimating Monthly Global Solar Radiation	Sharifi,S. Rezaverdinejad, V. Nourani, V. Behmanesh,J.	Water and Soil Sciences Journal	2020 Published online
58	Multi-station Calibration of Snowmelt Runoff Model (SRM) Using Remote Sensing Tool in Aji-Chay Basin, Iran	Vahid Nourani Amin Afkhaminia Soghra Andaryani	J. Civil & Env. Eng.,Tabriz Univ.	2020 Published online
59	Qualitative zoning of Tabriz Plain groundwater Resources with using WQI	Shiri, N. Nourani,V.	Hydrogeology	2021 Published online
60	Investigation of Hydro-Climatic and Vegetation Cover Trends and Complexities Effects on Water Table Using Wavelet-Entropy and Mann-Kendall	A. Afkhaminia , V. Nourani , S. Andaryani, A. Mokhtari Asl	Iran Water Res. Journal	2021 Vol.17(1)
61	Evaluation of Leachate Quality and its Effects on Agriculture in the Vicinity of Zanjan Landfill	Khodaverdi,Z. H. Baghanam,A. Nourani,A.	Water and Wastewater Journal	2022 Vol. 33(2)
62	Probabilistic zoning of hydraulic performance of water distribution network by applying key parameter uncertainty	Mehdi Dini, A. Mohammadikaleibar Vahid Nourani	J. Civil & Env. Eng.,Tabriz Univ.	2022 Published online

		Saeed Hashemi		
63	Uncertainty analysis of hydraulic conductivity parameter in groundwater modeling using null space Monte Carlo method	H Ebrahimi, T Rajae, V Nourani	Iranian Journal of Irrigation and Drainage	2022 Published online
64			Water and Soil Sciences Journal	2022 accepted
65	Investigation of Uncertainty to Artificial Intelligence Models in Tabriz Wastewater Treatment Plant	Reza Shahidi Zonouz, Vahid Nourani, Mehdi Dini	Water and Wastewater Journal	2023 accepted

7.2. Articles published in other internationally refereed journals

No.	Title of Paper	Authors	Place of Publication	Date of Publication
1	Laboratory Simulation of a Geomorphologic Runoff Routing Model Using Liquid Analog Circuits	Nourani,V., Monadjemi,P.	J. Env. Hydrol.	2006 Vol. 14(1)
2	Semi-distributed flood runoff model at sub-continental scale for southwestern Iran	Nourani,V., Mano,A.	Hydrol. Process.	2007
3	Liquid Analog Model for laboratory simulation of rainfall-runoff process	Nourani,V.,Singh,V.P., Monadjemi,P.	J. Hydrol. Eng.	2007 Vol. 14(1)
4	Forecasting spatiotemporal water levels of Tabriz aquifer	Nourani,V.,Mogaddam,A.A	Trends App. Sci. Res.	2008
5	A comparative study on calibration method of Nash's rainfall-runoff model	Nourani , V.	Journal of Urban and Environmental Engineering	2008
6	A combined neural-wavelet model for prediction of watershed precipitation ,Ligvanchai, Iran	Nourani,V., Alami,M.T.,Aminfar,M.H.	Eng. Application of Artificial Intelligence	2009 Vol. 22
7	Prediction of daily suspended sediment load using wavelet and NF combined model	T. Rajae S.A. Mirbagheri V. Nourani	International Journal Environ. Science	2009
8	Using ANNs for sediment forecasting of Talkherood river mouth	Nourani, V.	Journal of Urban and Environmental	2009
9	An ANN-based model for spatiotemporal groundwater level Forecasting	Nourani,V.,Mogaddam,A.A., Nadiri,A.O	Hydrol. Process	2009 Vol. 22

10	Three geomorphological rainfall-runoff models based on the linear reservoir concept	Nourani,V.,Singh,V.P., Delafroz,H.	CATENA	2009 Vol. 76(3)
11	A multivariate ANN-wavelet approach for rainfall-runoff modeling	Nourani,V., Komasi,M.,Mano,A.	Water Resor. Manage	2009 Vol. 23
12	Daily suspended sediment concentration simulation using ANN and neuro-fuzzy models	T. Rajaei S.A. Mirbagheri	Science of the Total Environment	
13	Application of ant colony optimization to optimal design of open channels	V. Nourani S. Talatahari	Journal of Hydraulic Research	2009
14	Reply to comment on ,Nourani V ,Mogaddam AA ,Nadiri AO.2008.An ANN- based model for spatiotemporal groundwater level forecasting.	Nourani, V.	Hydrological Processes	2010
15	Neuro-fuzzy models employing wavelet analysis for suspended sediment concentration prediction in rivers	S.A.Mirbagheri V. Nourani	Hydrological Science Journal	2010
16	An integrated artificial neural network for spatiotemporal modeling of rainfall-runoff-sediment processes	Nourani, V. Kalantari, O.	Environmental Engineering Science	2010 Vol.27(5)
17	Spatiotemporal Groundwater Level Forecasting in Coastal Aquifers by Hybrid Artificial Neural Network-Geostatistics Model: A Case Study	Nourani,V. Edjlali, R.G. Alami, M.T.	Environmental Engineering Science	2011 Vol.28(3)
18	Two hybrid artificial intelligence approaches for modeling rainfall-runoff process	Nourani V. Kisi, O. Komasi M	Journal of Hydrology	2011 Vol.402
19	Studying of flow model and bed load transport in a coarse bed river: case study - Aland River, Iran	Roushangar,K. Hassanzadeh,Y. Keynejad, M.A. Alami,M.T.	Journal of Hydroinformatics	2011 Vol. 13(4)
20	TOPMODEL capability for rainfall-runoff modeling of the Ammameh watershed at different time scales using different terrain algorithms	Nourani, V., A. Roughani,	Journal of Urban and Environmental Engineering	2011 Vol.5(1)
21	River suspended sediment load prediction: Application of ANN and wavelet conjunction model	Rajaei,T. Nourani, V. Zounemat-Kermani M	Journal of Hydrologic Eng.	2011 Vol.16(8)
22	Implementation of Artificial Neural Network Technique in the Simulation of Dam Breach Hydrograph	Nourani, V. Hakimzadeh, H.	Journal of Hydroinformatics	2012 Vol.14(2)
23	Application of AI tools to estimate prak outflow from earth dam breach	Amini,A.R. Nourani,V. Hakimzadeh,H.	Int. J. Earth Sci. Eng.	Vol.4(6) 2011

24	Sensitivity analysis of the artificial neural network outputs in simulation of the evaporation process at different climatologic regimes	Nourani,V. Sayyah Frad, M.	Advances in Engineering Software	2012 Vol. 47(1)
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160	Improving novel extreme learning machine using PCA algorithms for multi-parametric modelling of municipal wastewater treatment plan	S.I. Abbaa, Gozen Elkiranb, Vahid Nouranic	Desalination and Water Treatment	2021 Vol. 215

161	The potential of integrated hybrid pre-post-processing techniques for short-to long-term drought forecasting	Roushangar,K. Ghasempour,R. Nourani,V.	Journal Hydroinformatics	2021 Vol. 23(1)
162	Artificial intelligence based ensemble modeling of wastewater treatment plant using jittered data	Nourani,V. Asghari, P. Sharghi,E.	J. Cleaner Production	2021 Vol. 291
163	Forecasting CO Pollutant Concentration of Tabriz City Air Using Artificial Neural Network and Adaptive Neuro-Fuzzy Inference System and its Impact on Sustainable Development of Urban	Nourani,V. Karimzadeh,H. Baghanam, A.H.	Env. Earth Sci.	2021 Vol 80(4)
164	Prediction interval estimation methods for Artificial Neural Network (ANN)- based modeling of the hydro-climatic processes, a review	Nourani,V. Jabarian,N Tanaka,H.	Sustainability	2021 Vol. 13(4)
165	Estimation of Suspended Sediment Load Using Artificial Intelligence-Based Ensemble Model	Nourani,V. Gokçekuş,H. Gelete,G.	Complexity	2021 Vol. 2021
166	Evaluation of the effluent quality parameters of wastewater treatment plant based on uncertainty analysis and post-processing approaches (case study)	Hejabi,N. Saegebian,S.M. Alami,M.T. Nourani,V.	Water Science & Technology	2021 Vol. 83(7)
167	Optimal Design and Feature Selection by Genetic Algorithm for Emotional Artificial Neural Network (EANN) in Rainfall-Runoff Modeling	Molajou, A., Nourani, V., Afshar, A. Khosravi,M.	Water Res Manag	2021 Vol 35

168	A statistical framework to project wave climate and energy potential in the Caspian Sea; CMIP6 scenarios	M. J. Alizadeh, V. Nourani , M. R. Kavianpour	Int. Journal of Env. Sci. Tech.	2022 Vol. 19
169	Ensemble data-driven rainfall-runoff modeling using multi-source satellite and gauge rainfall data input fusion	Nourani,V. Gokçekuş,H. Tagesse, G	Earth Science Informatics	2021 Vol. 14
170	Dam failure peak outflow prediction through GEP- SVM meta models and uncertainty analysis	Nobarinia, M., Kalateh,F. Nourani,V. Amini,A.B.A	Water Supply	2021 Vol. 21
171	Using hybrid wavelet-exponential smoothing approach for streamflow modeling	Nourani,.V. Najafi,H. Amini,A.B. Tanaka,H.	Complexity	2021 Vol 2021
172	A novel multi-model data-driven ensemble approach for the prediction of particulate matter concentration	Umar, I.K., Nourani, V. Gökçekuş, H.	Environmental Science and Pollution Research	2021 Vol.202 1
173	Integration of Hard and Soft Supervised Machine Learning for Flood Susceptibility Mapping	Andaryani,S. Nourani,V. Torabi H.,A. Keesstra,S.	Journal of Environmental Management	2021 Vol. 291
174	Development of Artificial Intelligence Models for Well Groundwater Quality Simulation: Different Modeling Scenarios	N. Shiri, J. Shiri, Z. M. Yaseen, S. Kim,	PLOS ONE	2021 Vol. 16

175	Investigation of Climate, Land Cover and Lake Level Pattern Changes and Interactions Using Remotely Sensed Data and Wavelet Analysis	Nourani,V. Tootonchi,R. Andaryani,S.	Ecological Informatics	2021 Vol. 64
176	The Utility of a Hybrid GEOMOD-Markov Chain Model of Land-Use Change in the Context of Highly Water-Demanding Agriculture in a Semi-Arid Region	Andaryani, S., Sloan, S. Nourani, V. Keshtkar, H.R.	Ecological Informatics	2021 Vol. 64
177	A Comparison of Frameworks for Separating the Impacts of Human Activities and Climate Change on River Flow in Existing Records and Different Near-Future Scenarios	Andaryani,S. Nourani,V. Ball,J. Jahanbakhsh Asl,S. Keshtkar,H.	Hydrol. Process.	2021 Vol. 35
178	Multi-Station Runoff-Sediment Modeling Using Seasonal LSTM Models	Nourani, V. Behfar,N.	Journal of Hydrology	2021 Vol. 601
179	Multi-Station Artificial Intelligence Based Ensemble Modeling of Suspended Sediment Load	Nourani, V. Kheiri, A. Behfar,N.	Water Supply	2022 Vol. 22(1)
180	Stochastic Long-Term Reliability of Water Distribution Networks Using Monte Carlo Simulation	Dini,M. Mohammadikaleibar,A. Hashemi,S. Nourani,V.	Urban Water Journal	2022 Vol. 19(2)
181	Impact of climate change on hydro-climatological parameters in North Cyprus: application of artificial intelligence based statistical downscaling models	Elkiran,G., Nourani,V., Elvis, O., Abdullah, J.	Journal of Hydroinformatics	2021 Vol. 23

182	Investigating the main reasons for the tragedy of large saline lakes: Drought, climate change, or anthropogenic activities? A call to action	Froumandi,E Nourani,V. Kantoush,S.A.	Journal of Arid Environments	2022 Vol. 196
183	Artificial intelligence models for suspended river sediment prediction: state-of-the art, modelling framework appraisal, and proposed future research directions	Hai Tao, Zainab S. Al-Khafaji, Chongchong Qi , Mohammad Zounemat-Kermani , Ozgur Kisi , Tiyasha Tiyasha , Kwok-Wing Chau , Vahid Nouranik, , Assefa M. Melesse , Mohamed Elhakeem , Aitazaz Ahsan Farooque, A. Pouyan Nejadhashemir	Engineering applications of computational fluid mechanics	2021 Vol 15
184	Spatiotemporal Analysis of Droughts Over Different Climate Regions Using Hybrid Clustering Method	Roushanghar,K. Ghasempour, R. Nourani,V.	Water Resources Management	2022 Vol 36(2)
185	Multi-station calibration strategy for evaluation and sensitivity analysis of the Snowmelt Runoff Model using MODIS satellite images	Nourani,V. Afkhaminia,A. Andaryani,S. Zhang,Y.	Hydrology Research	2021 Vol 52(6)
186	Application of Z-Numbers to teleconnection modeling between monthly precipitation and large scale sea surface temperature	Najafi, H., Nourani, V. Sharghi, E. Roushangar, K.	Hydrology Research	2022 Vol. 53(1)
187	Evaluation of Global Forecast System (GFS) Medium-Range Precipitation Forecasts in the Nile River Basin	Yue, H. Gebremichel,M. Nourani,V.	Journal of Hydrometeor.	2022 Vol. 23(1)

188	Multiscale Coherence Analysis of Reference Evapotranspiration of North Western Iran Using Wavelet Transform	Sreedevi, V., Adarsh, S., Nourani, V.	Journal of Water and Climate Change	2022 Vol 13
189	Application of PPIE method to assess the uncertainty and accuracy of multi-climate model based temperature and precipitation downscaling	Nourani, V. Jabbarian, N. Huang, J.	Theoretical and Applied Climatology	2022 Vol 147
190	Applications of Artificial Intelligence Based Methods in Seepage Modeling, a Review	Nourani, V. Behfar, N. Debrowska, D. Zhang, Y.	Water	2021 Vol. 13
191	Robust clustering for assessing the spatiotemporal variability of groundwater quantity and quality	Nourani, V. Ghanei, P. Kantoush, S. A.	Journal of Hydrology	2022 Vol. 604
192	Performance of the Global Forecast System's Medium-Range Precipitation Forecasts in the Niger River Basin Using Multiple Satellite-Based Products	Yue, H. Gebremichel, M. Nourani, V.	Hydrology and Earth System Science	2022 Vol. 26
193	Investigation of the effect of velocity on secondary currents in semicircular channels on hydraulic jump parameters	B. Fatehi-Nobarian, R. Panahi, V. Nourani	Iranian J. Science & Technology, Trans. Civil Eng.	2022 Vol 46
194	Improving the performance of random forest for estimating monthly reservoir inflow via complete ensemble empirical mode decomposition and wavelet analysis	Ahmadi, F., Mehdizadeh, S. , Nourani, V.	Stochastic Environmental Research and Risk Assessment	2022 Vol. 36

195	Linking Spatial–Temporal Changes of Vegetation Cover with Hydroclimatological Variables in Terrestrial Environments with a Focus on the Lake Urmia Basin	Foroumandi, E., Nourani, V., Dąbrowska, D., Kantoush, S.A	Land	2022 Vol. 11
196	Deep learning-based uncertainty quantification of groundwater level predictions	Nourani, V., Khodkar, K., Paknezhad, N.J., Laux, P.	Stochastic Environmental Research and Risk Assessment	2022 Vol. 38
197	Unraveling the backbone of climate networks from the analysis of collective dynamics and time reversal	Naghipour, L. Aalami, M.T. Nourani, V.	Int. J. Climatology	2022 Vol. 42
198	Uncertainty assessment of LSTM based groundwater level predictions	Nourani, V., Khodkar, K. Gebremichael, M.	Hydrol. Sci J	2022 Vol 67(5)
199	Spatiotemporal evaluation of future groundwater recharge in arid and semi-arid regions under climate change scenarios	Andaryani, S. Nourani, V. Pradhan, B. Jalali, T.	Hydrol. Sci J	2022 Vol. 67(6)
200	Wavelet-based predictor screening for statistical downscaling of precipitation and temperature using artificial neural network method	Hosseini Baghanam, A. Nourozi, E. Nourani, V.	Hydrology Research	2022 Vol. 53
201	The Accuracy of Precipitation Forecasts at Timescales of 1-15 days in the Volta River Basin	Gebremichel, M. Yue, H. Nourani, V.	Remote Sensing	2022 Vol. 14

202	A New Evolutionary Hybrid Random Forest Model for SPEI Forecasting	Danandeh Mehr, A.; Torabi Haghghi, A.; Jabarnejad, M.; Safari, M.J.S.; Nourani, V.	Water	2022 Vol. 14
203	The Skills of Medium-Range Precipitation Forecasts in the Senegal River Basin	Gebremichael, M., Yue, H., Nourani, V., Damoah, R	Sustainability	2022 Vol. 14
204	Multi-Time-Step Ahead Daily Global Solar Radiation Forecasting: Performance Evaluation of Wavelet-Based Artificial Neural Network Model	Sharifi, SS., Rezaverdinejad, V., Nourani, V. Behmanesh, J.	Meteorology and Atmospheric Physics	2022 Vol. 134
205	Application of a novel technique of the multi-discrete wavelet transforms in hybrid with artificial neural network to forecast the daily and monthly streamflow	Momeneh, S. Nourani, V.	Modeling Earth Systems and Environment	2022 Vol. 8
206	Multi-Step-Ahead Solar Irradiance Modeling Employing Multi-Frequency Deep Learning Models and Climatic Data	Nourani, V. Sharghi, E. Behfar, N. Zhang, Y.	Applied Energy	2022 Vol. 315
207	Application of Artificial Intelligence Approach and Remotely Sensed Imagery for Soil Moisture Evaluation	Nourani, V.	Hydrology Research	2022 Vol. 53
208	On the Detection and Attribution of Streamflow Persistence of Rivers in Peninsular India	Adarsh, S., Nourani, V., Johnson, A. Jayan, A.	Acta Geophysica	2022 Vol. 70

209	Reconstructing daily discharge in a megadelta using machine learning techniques	Thanh, H.V., Van Binh, D., Kantoush, S. A., Nourani, V.,	Water Resour. Res.	2022 Vol 58
210	Forecasting of groundwater level fluctuations using a hybrid of multi-discrete wavelet transforms with artificial intelligence models	Momeneh,S. Nourani, V.	Hydrology Research	2022 Vol. 53
211	Conjunction of cluster ensemble - model ensemble techniques for spatiotemporal assessment of groundwater depletion in semi-arid plains	Sharghi,E. Nourani,V. Zhang,Y. Ghanei,P.	Journal of Hydrology	2022 Vol. 610
212	AI-based ensemble modeling of landfill leakage employing a lysimeter, climatic data and transfer learning	Baghanam, H. A., Vakili,T., A. Nourani, V. Dąbrowska, D.	Journal of Hydrology	2022 Vol 612
213	Investigation of quantitative and qualitative changes in groundwater of Ardebil Plain using ensemble artificial intelligence-based modeling	Sarreshtedar,A. Sharghi,E. Afkhaminia,A. Nourani,V.	Water Supply	2022 Vol. 22
214	Saturated and unsaturated seepage analysis of earth-fill dams using fractal hydraulic conductivity function and its verification	Nourani, V. Ojaghi, A. Zhang,Y.	Journal of Hydrology	2022 Vol. 612
215	The detection and monitoring of pollution caused by gold mining using a vegetation cover index	Soghra Andaryani1, Vahid Nourani1, Farnaz Ershadfath, Fatemeh Hashemi, Ali Torabi Haghighi,	Environmental Science and Pollution Research	2023 Vol. 30

216	In situ lysimeter experiment of leaching pollutants from municipal waste with physicochemical status and microbiome condition	Dabrowska, D. Nowak, A., Soltysiak, M. Paulin, B.	Journal of Hydrology	2022 Vol 613
217	An intelligent soft computing technique for prediction of vehicular traffic noise	Ibrahim Khalil Umar, Hüseyin Gökçekuş, Vahid Nourani	Arabian Journal of Geosciences	2022 Vol. 15
218	A Z-Number based multi-attribute decision-making algorithm for hydro-environmental system management	Nourani, V. Najafi, H.	Neural Computing and Applications	2022 Published online
219	A 1-km daily soil moisture dataset over China using in-situ measurement and machine learning	Qingliang Li, Gaosong Shi, Wei Shangguan, Vahid Nourani, Jianduo Li, Lu Li, Feini Huang, Ye Zhang, Chunyan Wang, Dagang Wang, Jianxiu Qiu, Xingjie Lu, Yongzhi Dai	Earth System Science Data	2022 Vol. 14
220	Drought monitoring by downscaling GRACE-derived terrestrial water storage anomalies: a deep learning approach	Ehsan Foroumandi, Vahid Nourani, Jinhui Jeanne Huang, Hamid Moradkhani	Journal of Hydrology	2023 Vol. 616
221	Flood risk analysis and Mapping under Compound Hazards: A Copula Approach for tropical coastal district of Alappuzha, India	Sneha Binoy, J.P. Jyoma, S. Adarsh, A. Muhammed Siddik, Vahid Nourani, A. Alisha, T. Sreeshma	Journal of Hydro-environment Research	2023 Vol. 46
222	Spatiotemporal variations of air pollution during the COVID-19 pandemic across Tehran, Iran: commonalities with and differences from global trends	Mohsen Maghrebi , Ali Danandeh Mehr , Seyed Mohsen Karrabi , Mojtaba Sadegh ,Sadegh Partani , Behzad Ghiasi , Vahid Nourani	Sustainability	2022 Vol. 14

223	An intelligent hybridized computing technique for the prediction of roadway traffic noise in urban environment	Ibrahim Khalil Umar, Vahid Nourani, Huseyin Go kçekus, S. I. Abba	Soft Computing	2023 Publish ed online
224	Collective dynamics analysis based on the multiplex network method to unravel the backbone of fluctuations in groundwater level data	Naghipour, L., Aalami, M. T., Nourani, V.	Computer Geos.	2023 Vol. 172
225	Glacier retreating analysis on the southeastern Tibetan Plateau via multisource remote sensing data	Y. Xiao, C. -Q. Ke, Y. Cai, X. Shen,	IEEE Journal of Selected Topics in Applied Earth Observations and Remote Sensing	2023 Vol. 16
226	Ensemble physically-based semi-distributed models for the rainfall-runoff process modeling for the data-scarce Katar catchment, Ethiopia	Gebre Gelete, Vahid Nourani, Huseyin Gokcekus, Tagesse Gichamo	Journal of Hydroinformatics	2023 Publish ed online
227	Spatio-temporal analysis of climate and irrigated vegetation cover changes and their role in lake water level depletion using a pixel-based approach and canonical correlation analysis	Andaryani S, Nourani V, Abbasnejad H, Koch J,	Science of the Total Environment	2023 Vol. 873
228	Optimizing Extreme Learning Machine for Drought Forecasting: Water Cycle vs. Bacterial Foraging	Ali Danandeh Mehr, Rifat Tur, Mohammed Mustafa Alee, Enes Gul , Vahid Nourani ,	Sustainability	2023 Vol. 15
229	Assessing long-term climate change impact on spatiotemporal changes of groundwater level using autoregressive-based and ensemble machine learning models	Vahid Nourania, Ali H. Ghareh Tapeha, Kasra Khodkara , Jinhui Jeanne Huang	Journal Env. Manage.	2023 Vol. 336

230	A fuzzy logic based approach for groundwater vulnerability assessment	Vahid Nourani; Sana Maleki; Hessam Najafi; Aida Hosseini Baghanam	Environmental Science and Pollution Research	2023 Published online
231	Z-Numbers based novel method for assessing groundwater specific vulnerability	Sana Maleki; Vahid Nourani; Hessam Najafi; Aida Hosseini Baghanam; Chang-Qing Ke	Engineering Applications of Artificial Intelligence	2023 Vol. 122
232	Causes, Types and Consequences of Municipal Waste Landfill Fires—Literature Review	Dabrowska, D.; Rykala, W.; Nourani, V.	Sustainability	2023 Vol. 15
233	Drought Monitoring and Forecasting across Turkey: A Contemporary Review	Pekpostalci, D.S.; Tur, R.; Danandeh Mehr, A.; Vazifekhah G., M.A.; Dabrowska, D.;	Sustainability	2023 Vol. 15
234	Drought monitoring and assessment across Erbil using satellite products	Alee, M.M.; Danandeh Mehr, A.; Akdegirmen, O.; Nourani, V.	Sustainability	2023 Vol. 15
235	GEDl: A New LiDAR Altimetry to Obtain the Water Levels of More Lakes on the Tibetan Plateau	J. Wu, C. -Q. Ke, Y. Cai, V. Nourani,	IEEE Journal of Selected Topics in Applied Earth Observations and Remote Sensing	2023 Published online
236	A 1-km global carbon fluxes dataset using in-situ measurements and deep learning	Shangguan, W.; Xiong, Z.; Nourani, V.; Li, Q.; Lu, X.; Li, L.; Huang, F.; Zhang, Y.; Sun, W.; Dai, Y.	Forests	2023 Vol. 14

237	Performance evaluation of artificial neural network model in hybrids with various preprocessors for river streamflow forecasting	Sadegh Momeneh, Vahid Nourani	AQUA — Water Infrastructure, Ecosystems and Society	2023 Published online
238	Upscaling of air–water system and capillary entrapment of methane in porous media	Devasena, M., Nourani, V., Maheswar, R. Sharghi, E.	Arabian Journal of Geosciences	2023 Vol. 16
239	Towards interpreting machine learning models for predicting soil moisture droughts	Huang, Feini; Zhang, Yongkun; Zhang, Ye; Nourani, Vahid;	Environ. Res. Lett.	2023 Vol. 18
240	Physical and artificial intelligence-based hybrid models for rainfall-runoff-sediment process modeling		Hydrol. Sci. J.	2023 Published online
241	Application of Meta-Heuristic Methods in Optimization of Geometrical Sections in Trapezoidal Channels in Jump Energy Loss		AQUA — Water Infrastructure, Ecosystems and Society	2023 accepted
242	Uncertainty quantification of deep learning based statistical downscaling of climatic parameters	Vahid Nourani; Kasra Khodkar; Aida Hosseini Baghanam; Sameh Ahmed Kantoush; Ibrahim Demir	Journal of Applied Meteorology and Climatology	2023 accepted
243	Optimization-based prediction uncertainty qualification of climatic parameters	Nourani, V., M. Sayyah-Fard, S. A. Kantoush, K. P. Bharambe,	Journal of Hydrometeorology	2023 accepted

244	Assessment of multifractal fingerprints of reference evapotranspiration based on multivariate empirical mode decomposition	Adarsh Sankaran , Thomas Plocoste , Vahid Nourani, Shamseena Vahab, Aayisha Salim	Atmosphere	2023 accepted
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7.3. Assertions presented in international scientific congresses and published in the proceedings

Title of Paper	Title and Place of Assembly	Date
A combined neural wavelet model for prediction of Ligvanchai watershed precipitation	9 th Int. Precipitation Conf. (France, Paris)	2007
Application of a threshold conditional neuron in rainfall-runoff modeling (in Farsi)	3 rd National Civil Eng. Conf. (Tabriz)	2007
Multi station suspended sediment load estimation by ANN(in Farsi)	3 rd National Civil Eng. Conf. (Tabriz)	2007
Tabriz	3 rd National Civil Eng. Conf. (Tabriz)	2007
Using ANN in parameters effects on suspended sediment load(in Farsi)	3 rd National Civil Eng. Conf. (Tabriz)	2007
Groundwater level forecasting by ARIMA model (in Farsi)	1st National groundwater symposium (Behbahan)	2007
Numerical modeling for simulation of the flow around a bridge pipe(in Farsi)	7 th Int. River Eng. Conf., (Ahvaz)	2007
Hydraulic parameters estimation of confined aquifer by GA(in Farsi)	25 th geography Conf. (Tehran)	2006
Evaluation of ANNs ability for complex aquifer modeling(in Farsi)	25 th geography Conf. (Tehran)	2006
Rainfall-Runoff Modeling of South-western Iran by TOPMODEL	15 th Congress of Asia and Pacific Division of AHER (India)	2006
Time-space water level prediction model for complex aquifers	Hydro Predict 2008 (Czech)	2008
Genetic Algorithm and Its Application in Statistical Analysis of	2nd Int. Conf. on Water Economics, Statistics and Finance (Greece)	2009
Spatiotemporal water levels forecasting by time series – geostatistics as a hybrid model (in Farsi)	26 th geography Conf. (Tehran)	2007
A 3-D seepage analysis model for earthen dams(in Farsi)	3 rd National Water Res. Manage. Conf. (Tabriz)	2008
An ANN-ARIMA combined model for rainfall-runoff modeling(in Farsi)	3 rd National Water Res. Manage. Conf. (Tabriz)	2008
Investigation of the temperature effect on suspended sediment load via ANFIS(in Farsi)	3 rd National Water Res. Manage. Conf. (Tabriz)	2008

Optimal design of concrete gravity dam using HBMO(in Farsi)	3 rd National Water Res. Manage. Conf. (Tabriz)	2008
Topographic data processing for rainfall-runoff modeling(in Farsi)	3 rd National Water Res. Manage. Conf. (Tabriz)	2008
Water supply network optimization by GA(in Farsi)	3 rd National Water Res. Manage. Conf. (Tabriz)	2008
Nash's model optimal parameters obtained by GA(in Farsi)	3 rd National Water Res. Manage. Conf. (Tabriz)	2008
Rainfall-runoff modeling using ANFIS and ANN-wavelet models(in Farsi)	4 th National Civil Eng. Conf. (Tehran Univ.)	2008
Rainfall-runoff modeling using ANN-wavelet model(in Farsi)	4 th National Civil Eng. Conf. (Tehran Univ.)	2008
ACO method for gravity dams optimization(in Farsi)	Dam Eng. National Conf. (Zanjan)	2009
Honey Bee Mating Optimization (HBMO) Implementation in Concrete Gravity Dam Layout Optimization(in Farsi)	Long term behaviour of dams (Graz, Austria)	2009
Using of adaptive neuro-fuzzy inference system for rainfall-runoff modeling	8 th International Congress on Civil Engineering Shiraz University, Shiraz (Shiraz)	2009
Sensitivity analysis of Dam breach parameters(in Farsi)	8 th International Congress on Civil Engineering Shiraz University, Shiraz (Shiraz)	2009
Meshless RBF method for earth dam seepage analysis(in Farsi)	8 th International Congress on Civil Engineering Shiraz University, Shiraz (Shiraz)	2009
ANFIS-wavelet hybrid model for runoff forecasting(in Farsi)	8 th International Congress on Civil Engineering Shiraz University, Shiraz (Shiraz)	2009
FIS and ANFIS models for suspended sediment load forecasting(in Farsi)	8 th International Congress on Civil Engineering Shiraz University, Shiraz (Shiraz)	2009
Comparative study on calibration methods of Nash's rainfall-runoff model;Case study:Ammameh watershed	7 th. Int. Conf. on Environment, Ecosystems and Development	2009
Using artificial neural networks (anns) for sediment load forecasting of Talkherood river mouth	3 rd Int. Conf. on Estuaries & Coasts (Japan)	2009
Using of ANFIS for rainfall-runoff modeling (in Farsi)	5 th. National Conf. on Civil Engineering (Univ. of Mashad)	2010

Investigation of permeability variation effect in numerical modeling of Zonouz Dam seepage (in Farsi)	5 th. National Conf. on Civil Engineering (Univ. of Mashad)	2010
A hybrid ARIMA-ANN model for rainfall-runoff-sediment process modeling of Aharchai watershed (in Farsi)	5 th. National Conf. on Civil Engineering (Univ. of Mashad)	2010
Permeability change driving effect on embankment dams Case Study: The Zonouz embankment dam	WATER AND GEOSCIENCE (Univ. Cambridge, UK)	2010
Numerical investigation of bridge pier breach due to different flow regimes	Iranian 9 th . Conf. in Haydraulic (Tarbyat Modares Univ.)	2010
Sensevity analysis of evapotranspiration process's parameters by ANN	4 th. National Water Res. Manage. Conf. (Amir Kabir Univ.)	2011
Using ANN and RBF methods for space-time modeling of rainfall	6 th. National Conf. on Civil Engineering (Semnan Univ.)	2011
Non-linear cascade resorvires model for rainfall-runoff simulation	6 th. National Conf. on Civil Engineering (Semnan Univ.)	2011
Application of artificial intelligence tools to estimate peak outflow from earth dam breach	Int. Conf. on Adv. Civil Eng. (India)	2011
Wavelet-based DEM regularization methodology aimed at improving distributed rainfall-runoff modeling	Community Surface Dynamic Modelin System (Colorado, USA)	2011
Continues wavelet transform for extraction of topographic features from high-resolution digital elevation model	9th WSEAS Int. Conf. (EED '11)	2011
Investigating the ability of Artificial Neural Network (ANN) models to estimate missing rain-gauge data	9th WSEAS Int. Conf. (EED '11)	2011
Space pre-processing of satellite data for ANN-based rainfall runoff process	9th WSEAS Int. Conf. (EED '11)	2011
Slope stability analysis of Zounous earth dam by ANN	First Int. Conf. Dams and Hydro-power Tehran	2012
Conjugation of Artificial Neural Network and Geostatistics Approaches for Groundwater Modeling	12th WSEAS Int. Conf. on Computer Applications in Science and Engineering Singapore	2012
Wavelet-based feature extraction of rainfall-runoff process via Self-Organizing Map	12th WSEAS Int. Conf. on Computer Applications in Science and Engineering Singapore	2012
ANN-based groundwater level forecasting employing SOM clustering approach	12th WSEAS Int. Conf. on Computer Applications in Science and Engineering Singapore	2012

Application of information content to extract wavelet-based feature of rainfall-runoff process	12th WSEAS Int. Conf. on Computer Applications in Science and Engineering Singapore	2012
ANN-Wavelet approach for satellite data pre-processing in rainfall-runoff modeling	9th Int. Congress on Civil Engineering, Isfahan, Iran	2012
Geomorphological-ANN Based Modeling for Estimation of Suspended Sediment Load	Nordic water, XXVII Nordic Hydrological Conf., Finland	2012
Landslide susceptibility mapping with analytical hierarchical process and GIS techniques (case study: Zonouz, East Azerbaijan, Iran)	10th Int. Cong. Advances in Civil Eng., Middle East Technical University, Turkey	2012
Groundwater Level Forecasting Using a Clustering Approach and Wavelet Neural Network Modeling	39th IAH Congress (International Association of Hydrogeologists) Canada	2012
Slope stability of concrete dams	2th National Conf. of Dam Eng.	2010
Dam breach and break modeling of Vanyar erthen dam	8 th Int. River Eng. Conf. Ahvaz	2010
GIS-based flood mapping of Goorganroud	8th Int. River Eng. Conf. Ahvaz	2010
Reservoirs sedimentation by GSTARS	8 th Int. River Eng. Conf. Ahvaz	2010
Water-Electricity demand investigation for Tabriz	7 th. National Conf. on Civil Engineering (Zahedan Univ.)	2013
Improvement of steel frames using rigid connections	7 th. National Conf. on Civil Engineering (Zahedan Univ.)	2013
Improves SARIMAX model for hydrological modeling	7 th. National Conf. on Civil Engineering (Zahedan Univ.)	2013
Rainfall-runoff modeling based on SOM and wavelet pre-processing techniques	8 th. Int. Conf. Water Res., Hydraulics & Hydrology, Rhodes, Greece	2013
Effect of DEM type and resolution in extraction of hydro-geomorphologic parameters	8 th. Int. Conf. Water Res., Hydraulics & Hydrology, Rhodes, Greece	2013

Appraisal to utilization of wavelet denoising approach in ANN-based hydrological models	8 th. Int. Conf. Water Res., Hydraulics & Hydrology,Rhodes, Greece	2013
Using ANN and ANFIS for modeling and sensitivity analysis of effective rainfall	8 th. Int. Conf. Water Res., Hydraulics & Hydrology,Rhodes, Greece	2013
SOM-ANN-based Rainfall-runoff Modelling using Data of Multiple Stations	35th Hydrology and Water Resources Symposium Perth, Australia	2014
Comparison of LiDAR and USGS DEMs in extracting hydro-geomorphologic features of watersheds	5th National Water Res. Manage. Conf. (Tehran)	2014
Wavelet-based trend analysis of hydrological processes at different time scales	5th National Water Res. Manage. Conf. (Tehran)	2014
Investigation of the effect of high resolution DEM noise in hydrological modeling	7 th. National Conf. on Civil Engineering (Babol Univ.)	2014
Spatial Estimation of Hydraulic Conductivity Using Multivariate Geostatistical Model. Case Study: Tabriz Subway Domain	4th International Field Workshop for Young Hydrogeologists (Poland)	2014
Optimal operation of multi-objective two reservoir systems	Int. Symp. on Dams in Global Environmental Challenges (Indonesia)	2014
Using Wavelet-Entropy Complexity Measure for Change Detection of Runoff Time Series	11th International Congress on Advances in Civil Engineering (Istanbul)	2014
Spatial analysis of Nahandchay watershed sedimentation via rainfall-runoff-sediment modeling	13 th. Hydraulic Conf. (Tabriz)	2014
Experimental investigation of flow pattern around steeped spillway	13 th. Hydraulic Conf. (Tabriz)	2014
Landslide susceptibility of Tabriz using AHP model via GIS	1 st National Geotechnical Eng. Conf. (Tehran)	2014
Wavelet Based Artificial Intelligence Approaches for Prediction of Hydrological Time Series	First Australasian Conference ON Artificial Life and Computational Intelligence	2015

Implication of ANN and SVM methods for Ajichai river sediment modeling	10 th Int. Cong. On Civil Eng. (Tabriz Univ.)	2015
Comparision of different geostatistical interpolator for rainfall modeling, Case Study: Ajichai	10 th Int. Cong. On Civil Eng. (Tabriz Univ.)	2015
Selection of the Robust Streamflow Forecasting Model Using Wavelet-Entropy Complexity Criterion	10 th Int. Cong. On Civil Eng. (Tabriz Univ.)	2015
Computational simulation of flow and energy dissipation in stepped spillways	10 th Int. Cong. On Civil Eng. (Tabriz Univ.)	2015
A new method for landslide susceptibility zonation using ANN and GIS; (Case study: North of Tabriz plain)	10 th Int. Cong. On Civil Eng. (Tabriz Univ.)	2015
Investigation of land use effects on Nash model parameters	European Geosciences Union General Assembly (Vienna)	2015
Wavelet-entropy for hydrological processes impact on river system	Vienna Technical Univ. (Vienna)	2015
Invistigation of hydroclimatic parameters on Urmya lake waater level	6th National Water Res. Manage. Conf.	2016
Multi-station calibration of Nash's rainfall-runof model	6th National Water Res. Manage. Conf. (Sharkord)	2016
Invistigation of NDVI trend and UH parameters of rainfall-runoff model	6th National Water Res. Manage. Conf. (Sharkord)	2016
Rainfall-runoff modeling using ANFIS model and comparison with ANN, time series and multi variate linear regression models	9 th. National Conf. on Civil Engineering (Mashad Univ.)	2016
Application of hybrid wavelet-SVM and GP in hydrological time series prediction (Case study: Aji-chay watershed)	9 th. National Conf. on Civil Engineering (Mashad Univ.)	2016
Application of association rules in investigation of regional precipitation	9 th. National Conf. on Civil Engineering (Mashad Univ.)	2016

Numerical solution of diffusion equation by collocation haar wavelet	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Assessment of Hydro-Climatologic Parameters Impacts on Urmia Lake Level Using Hybrid Wavelet-Mann Kendall	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Solving Richards equation using nudging data assimilation algorithm	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Use of nudging data assimilation algorithm to estimate unknown pumping rate	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Optimal Operation of Single-Reservoir system via Modified Algorithm Harmony Search (Case Study: Eleviyan Reservoir)	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Smart water grid as an approach to usage management in basins	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Evaluation of Wavelet Denoising Performance via an ANN-Based Rainfall-Runoff modeling	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Investigation of effect of hydrometeorological parameters on Urmia Lake's water level using wavelet coherence measure	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Comparison of Different Seasonal Models For Rainfall-Runoff modeling	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Exploring Effects of Wavelet debug in the process of identifying change point in the hydrologic time series of basin, Urmia lake	2nd International Conference on Civil,Architectural and Urban management <i>(Amir Kabir Univ.)</i>	2016
Temporal Chloride Modeling of Groundwater by Conjungtion of Artificial Intelligence and Wavelet Transform Coherence Approaches	9th GeoSymposium of Young	2016
Co-kriging and SOM pre-processing tools for groundwater quality modeling via ANN	1 st Int. Conf on Water, Enviroment and Sustainable Development (Ardabil Univ.)	2016
Semi-distributed geomorphologic rainfall-runoff modeling via multi-station optimization	4 th . International Congress on Civil Engineering , Architecture and Urban Development, Shahid Beheshti University ,	2016

AI-based (ANN and SVM) statistical downscaling methods for precipitation estimation under climate change scenarios	EGU General Assembly 2017 (Vienna)	2017
Flow Routing Using Haar Wavelet Colocation Method	16 th Iranian Hydraulic Conf. (Ardabil)	2017
Using Multiple Linearization Conceptual Model and Artificial Neural Network (ANN) for Flow Routing	16 th Iranian Hydraulic Conf. (Ardabil)	2017
Application of feature extraction methods for AI-based investigation of climate change effects on hydro climatological parameters	16 th Iranian Hydraulic Conf. (Ardabil)	2017
Investigation of climate change on temperature and rainfall of Tabriz Station	16 th Iranian Hydraulic Conf. (Ardabil)	2017
Risk Assessment of Earth Dam Overtopping Using System Dynamics and Monte Carlo Simulation (case study: Hajilarchay Dam)	4th International Conference on long-Term Behavior and Environmentally Friendly Rehabilitation Technologies of	2017
Groundwater risk assessment by lwpi due to landfill leachate impact	International conference On new approach to groundwater vulnerability	2018
Comparative Analysis of Artificial Intelligence Based Methods for Prediction of Precipitation. Case Study: North Cyprus	13th International Conference on Theory and Application of Fuzzy Systems and Soft	2018
Prediction bound estimation for ANN based hydrological models	11 th. National Conf. on Civil Engineering (Shiraz Univ.)	2019
Integral transformation in water resources Eng	11 th. National Conf. on Civil Engineering (Shiraz Univ.)	2019
Lessons from artificial recharge "a case study of jafakende watershed"	2nd Int. conf. water problems in Mediterranean countries N Cyprus (NEU)	2019
Estimation of artificial neural network prediction bounds in hydrology	2nd Int. conf. water problems in Mediterranean countries N Cyprus (NEU)	2019
A novel approach for precipitation modeling using artificial intelligence based ensemble models	2nd Int. conf. water problems in Mediterranean countries N Cyprus (NEU)	2019

Improving novel extreme learning machine using PCA algorithms for modeling the performance of municipal wastewater treatment plant	2nd Int. conf. water problems in Mediterranean countries N Cyprus (NEU)	2019
Markovian based modeling for wave height forecasting	2nd Int. conf. water problems in Mediterranean countries N Cyprus (NEU)	2019
Evaluating the efficiency of genetic algorithm (GA) in optimizing reservoir operation rules with considering environmental water demand	2nd Int. conf. water problems in Mediterranean countries N Cyprus (NEU)	2019
Artificial intelligence models for estimation of monthly global solar radiation: performance comparison of ANN and ANFIS models	2nd Int. conf. water problems in Mediterranean countries N Cyprus (NEU)	2019
Spatiotemporal Precipitation Modeling by AI Based Ensemble Approach	10th Int. Conf. on Theory and Application of Soft Computing, Computing with Words and Perceptions	2019
Artificial Intelligence based and Linear Conventional Techniques for Reference Evapotranspiration Modeling	10th Int. Conf. on Theory and Application of Soft Computing, Computing with Words and Perceptions	2019
Non-linear ensemble modeling for multi-step ahead prediction of treated COD in wastewater treatment plant	10th Int. Conf. on Theory and Application of Soft Computing, Computing with Words and Perceptions	2019
Wavelet transform for Artificial Intelligence (AI) based modeling of hydro-climatic processes	5th International Conference on Modeling and Simulation in Civil Engineering (India)	2019
Flood Susceptibility Mapping in Densely Populated Urban Areas Using Mcdm and Fuzzy Techniques	5th International Conference on Modeling and Simulation in Civil Engineering (India)	2019
Statistical Downscaling and Projection of Future Temperature Change for Tabriz City, Iran	5th International Conference on Modeling and Simulation in Civil Engineering (India)	2019
Estimation of ANN prediction bounds for suspended sediment load	5th International Conference on Modeling and Simulation in Civil Engineering (India)	2019
Application of ANN and screening method for downscaling of climatic parameters	5th International Conference on Modeling and Simulation in Civil Engineering (India)	2019
Forecasting CO Pollutant Concentration of Tabriz City Air Using Artificial Neural Network and Adaptive Neuro-Fuzzy Inference System and its Impact on Sustainable Development of Urban	2nd International Conference of Environment: Survival and Sustainability	2019

Forecasting of NO2 and SO2 of Tabriz Air using ANN and ANFIS	5 th Int Conf on Civil, Art. Urbani, Sust. Devel.	2019
Forecasting of PM10 of Tabriz Air using ANN and ANFIS	1 st national Conf. on Health and Environment	2019
Spatial clustering of wells network for GW level modeling via ANN	6th Int. Conf. Env. Eng. and Natural Resource	2020
Are drought and climate change the main reasons for the tragedy of large saline lakes?	5 th INT. CON. ENG. TECH. MANAGEMENT (Istanbul,Nisantasi Univ.)	2021
Prediction interval estimation methods for Artificial Neural Network (ANN)- based modeling of the hydro-climatic processes, a review	5 th INT. CON. ENG. TECH. MANAGEMENT (Istanbul,Nisantasi Univ.)	2021
Identification of dominant predictors for statistical downscaling of precipitation using wavelet coherence -a case study of tabriz city, iran	5 th INT. CON. ENG. TECH. MANAGEMENT (Istanbul,Nisantasi Univ.)	2021
Prediction of climate change impacts on rasht city precipitation with use of emotional artificial neural network	5 th INT. CON. ENG. TECH. MANAGEMENT (Istanbul,Nisantasi Univ.)	2021
Investigation of water quality by hydro chemical diagrams	5 th INT. CON. ENG. TECH. MANAGEMENT (Istanbul,Nisantasi Univ.)	2021

7.7. Other publications

8. Projects

The monitoring of changes in glacial lakes in western Asia supported by remote sensing big data and artificial intelligence

9. Administrative Services

Job Title	Place of Work	Date		Name of Institution
		From	To	
Vice Dean	Faculty of Civil Eng.	2018	present	Univ. of Tabriz, Faculty of Civil Eng.
Director	Center of Excellence in Hydroinformatics	2019	present	Univ. of Tabriz

Head of Department	Water Resources Eng.	2014	2018	Univ. of Tabriz, Faculty of Civil Eng.
Head of Hydraulic Lab.	Water Resources Eng.	2006	2012	Univ. of Tabriz, Faculty of Civil Eng.

10. Professional Affiliations

Name of Institution/Association	Position Held	Country	Year
<i>Journal of Hydrology</i>	<i>Editorial board member</i>	<i>Elsevier</i>	<i>2018-present</i>
<i>AQUA - Water Infrastructure, Ecosystems and Society</i>	<i>Editorial board member</i>	<i>IWA</i>	<i>2022-present</i>
<i>Water</i>	<i>Guest Editor</i>	<i>MDPI</i>	<i>2021</i>
<i>Sustainability</i>	<i>Guest Editor</i>	<i>MDPI</i>	<i>2022</i>
<i>Remote Sensing</i>	<i>Guest Editor</i>	<i>MDPI</i>	<i>2022</i>
<i>Atmospher</i>	<i>Guest Editor</i>	<i>MDPI</i>	<i>2022</i>
	<i>Guest Editor</i>		<i>2023</i>
<i>Civil Engineering Infrastructures Journal</i>	<i>Editorial board member</i>	<i>Tehran Univ</i>	<i>2021-</i>
<i>IWRA</i>	<i>Member</i>	<i>Iran</i>	<i>2006-present</i>
<i>IAHS</i>	<i>Member</i>	<i>Europe</i>	<i>2006-present</i>
<i>J. Civil and Environ. Eng.</i>	<i>Editorial board member.Editor-in-</i>	<i>Iran(Univ of Tabriz)</i>	<i>2007-present</i>
<i>Hydro-Geomorpholog Journal</i>	<i>Editorial board member</i>	<i>Iran(Univ of Tabriz)</i>	<i>2014-present</i>
<i>IAEH</i>	<i>Member</i>	<i>USA</i>	<i>2006-present</i>
<i>J. of Civil & Env. Res.</i>	<i>Editorial board member</i>	<i>Iran(Univ of Qom)</i>	<i>2015-present</i>
<i>Environment & Health Journal</i>	<i>Editorial board member</i>	<i>Iran(Medical Univ. of</i>	<i>2013-present</i>
<i>Iranian J of Ecohydrology</i>	<i>Editorial board member</i>	<i>Tehran Univ.</i>	<i>2021-present</i>
<i>Int. J. Soft Computing and Engineering</i>	<i>Editorial board member</i>	<i>India</i>	<i>2011-present</i>
<i>Advances in Computational Research</i>	<i>Editorial board member</i>	<i>India</i>	<i>2011-present</i>
<i>Int. J. Earth Sciences and Engineering</i>	<i>Editorial board member</i>	<i>India</i>	<i>2012-present</i>
<i>Int. J. Eng. and Advanced Technology</i>	<i>Editorial board member</i>	<i>India</i>	<i>2011-present</i>

<i>Int. J. Recent Tech. and Engineering</i>	<i>Editorial board member</i>	<i>India</i>	<i>2011-present</i>
<i>Artificial Intelligence Research</i>	<i>Editorial board member</i>	<i>Canada</i>	<i>2012-present</i>
<i>Radical J. Computer Science and Information Technology</i>	<i>Editorial board member</i>	<i>India</i>	<i>2012-present</i>
<i>Dataset Papers in Geology Journal</i>	<i>Editorial board member</i>	<i>USA</i>	<i>2012-present</i>
<i>Int. J. Soft Computing, Mathematics and Control</i>	<i>Editorial board member</i>	<i>Australia</i>	<i>2012-present</i>

11. Fellowships and Awards

Title of Award, Medal, Position	Issuing Authority	Country	Year
<i>Ph.D. scholarship</i>	<i>Ministry of Science</i>	<i>Iran</i>	<i>2001</i>
<i>Abroad Research Scholarship</i>	<i>Ministry of Science</i>	<i>Iran</i>	<i>2004</i>
<i>Outstanding researcher award</i>	<i>Tabriz University</i>	<i>Iran</i>	<i>2008</i>
<i>Best paper award</i>	<i>7 Int. Conf. Environment, Ecosystems and Development</i>	<i>Spain</i>	<i>2009</i>
<i>Abroad Research Scholarship</i>	<i>Univ. of Tabriz</i>	<i>Iran</i>	<i>2010</i>
<i>Outstanding researcher award</i>	<i>Tabriz University</i>	<i>Iran</i>	<i>2011</i>
<i>Invited Plenary Speaker</i>	<i>9 Int. Conf. Environment, Ecosystems and Development</i>	<i>Swiss</i>	<i>2011</i>
<i>Nominated in Marquis Who's Who in the World 2012</i>	<i>Marquis Who's Who</i>	<i>USA</i>	<i>2012</i>
<i>Best paper award</i>	<i>12 Int. Conf. Applied Computer Science</i>	<i>Singapore</i>	<i>2012</i>
<i>Invited Plenary Speaker</i>	<i>8 th. Int. Conf. Water Res., Hydraulics & Hydrology</i>	<i>Greece</i>	<i>2013</i>
<i>Invited Plenary Speaker</i>	<i>12 Int. Conf. Applied Computer Science</i>	<i>Singapore</i>	<i>2012</i>
<i>Most Cited paper in journal "Engineering Applications of Artificial Intelligence"</i>	<i>Nourani, et a.l, 2009, "A combined neural-wavelet model for prediction of Ligvanchai watershed precipitation"</i>	<i>Elsevier</i>	<i>2013</i>
<i>Outstanding researcher award</i>	<i>Tabriz University</i>	<i>Iran</i>	<i>2013</i>

<i>Invited Kenote Speaker</i>	<i>The 2nd International Conference on Civil,Architectural and Urban managment Science</i>	<i>Iran</i>	<i>2016</i>
<i>Best paper award</i>	<i>7th International Conference on Environment and BioScience</i>	<i>South Korea</i>	<i>2017</i>
<i>Outstanding researcher award</i>	<i>Tabriz University</i>	<i>Iran</i>	<i>2017</i>
<i>Outstanding researcher award</i>	<i>Near East University</i>	<i>N. Cyprus</i>	<i>2017</i>
<i>Outstanding researcher award</i>	<i>Near East University</i>	<i>N. Cyprus</i>	<i>2018</i>
<i>Among 1% outstanding scientists of the world</i>	<i>Univ. of Tabriz</i>	<i>Iran</i>	<i>2018</i>
<i>Invited Keynote Speaker</i>	<i>Application of Integral Transforms in hydro-climatic studies</i>	<i>Shiraz, Iran</i>	<i>2019</i>
<i>Invited Keynote Speaker</i>	<i>Application of Integral Transforms in hydro-climatic studies</i>	<i>N. Cyprus</i>	<i>2019</i>
<i>Invited Keynote Speaker</i>	<i>Wavelet transform for Artificial Intelligence (AI) based modeling of hydro-climatic processes</i>	<i>India,TKMC E</i>	<i>2019</i>

<i>Among 1% outstanding scientists of the world</i>	<i>Univ. of Tabriz</i>	<i>Iran</i>	<i>2019</i>
<i>Among 1% outstanding scientists of the world</i>	<i>Univ. of Tabriz</i>	<i>Iran</i>	<i>2020</i>
<i>Among World's Top 2% Scientists</i>	<i>Stanford University</i>	<i>USA</i>	<i>2020</i>
<i>Invited Keynote Speaker</i>	<i>Nişantaşı University</i>	<i>Turkey</i>	<i>2021</i>

12. Please fill out the chart below for undergraduate and graduate courses you have given in the last 2 years.

Title of Course	Level	Dates		Name of Institution
		From	To	
Special topics in water engineering	Ph.D.	2008	present	Tabriz University
Advanced computational	Ph.D.	2006	present	Tabriz University
Advanced mathematics	M.Sc.	2006	present	Tabriz University
Advanced hydrology	M.Sc.	2005	present	Tabriz University
Numerical methods in water	M.Sc.	2007	present	Tabriz University
Application of GIS to water engineering	B.S.	2007	present	Tabriz University and Near East Univ.
Engineering hydrology	B.S.	2006	present	Tabriz University
Fluid mechanics	B.S.	2008	present	Tabriz University
Special topics in water and soil	Ph.D.	2010	present	Tabriz University, Faculty of Agri.
Water Resources Management	M.Sc.	2010	present	Tabriz Univ. of Medicine
Advection - Dispersion modeling of	M.Sc.	2014	present	Tabriz University
Hydroinformatics	M.Sc.	2014	present	Tabriz University and Near East Univ.