Curriculum Vitae MANSOUR ZIAII

(Associate professor Deport. of Mining, Petroleum and Geophysics Engineering. Shahrood University of Technology)

Personal Details

Name: Mansour Ziaii Date of birth: 2, April, 1968 Nationality: Iranian Cell Phone: (+98) 9151164886 Email: mziaii@shahroodut.ac.ir, m.ziaii47@gmail.com



Qualifications

B.Sc: Mining Engineering, 1986-1991, Isfahan University of Technology, Isfahan, Iran Russian language: 1993-1994, Moscow State Mining University (MSMU), Moscow, Russia
M.Sc.: 1994-1996, Geochemical Methods of Prospecting, Lomonosov Moscow State University (MSU), Geological faculty, Deportment of Geochemistry, Moscow, Russia
PhD. 1996-1999, Institute of Geology of ore deposits, petrography, mineralogy and Geochemistry, Russian Academy of Science (IGEM RAN)

Work Experiences

Dr. Mansour Ziaii, is currently with the School of Mining, Petroleum & Geophysics Engineering at the Shahrood University of Technology, in Shahrood, Iran. He is currently focused on the topics of mining geochemistry, modeling in earth science using GIS, Remote sensing (RS), GPS, Neuro-Computing technologies with on-the-ground knowledge of exploration and mineral resource. In 1996 he got the M. Sc. degree [Geochemical Methods of Prospecting] from Lomonosov Moscow State University (MSU), Moscow, Russia. He holds Ph.D. in geochemical and mineralogical from the Russian Academy of Science (IGEM RAS), Moscow, Russia. He has published several journal articles and conference papers.

Book

[1]- Ziaii, M. (2019). Mining geochemistry (Thermodynamics of geochemical processes). STS publication, 419pp. (in Persian)

Papers

[1]- **Ziaii, M**. (1996). Lithogeochemical exploration methods for porphyry copper deposit in Sungun, NW Iran. Unpublished M. Sc. thesis, Moscow State University (MSU), Moscow (in Russian).

[2]- Grigorian, S. V., & **Ziaii**, **M.** (1997). Computing methods for determination of geochemical haloes background. In International symposium, applied geochemistry in CIS. (in Russian)

[3]- Grigorian, S.V., Liakhovich, T.T., Getmansky, I.I., & Ziaii, M. (1999). Trace elements in minerals as a criterion of geochemical anomaly estimations. Journal of Science and Technology, 1, 22–26 (in Russian with English abstract).

[4]- Grigorian, S.V., Liakhovich, T.T., Getmansky, I.I., & **Ziaii, M.** (1999). Geochemical spectrum of minerals as a criterion of gold ores type identification. Journal of Science and Technology, 3, 5–8 (in Russian with English abstract)

[5]- Ziaii, M. (1999). Technique rational mineralogical and geochemical sampling ore manifestation of gold. Unpublished Ph.D. thesis of Geol-mineral Nauk, IGEM RAN, Moscow 140pp (in Russian).

[6]- Ziaii, M., Pouyan, A. A., & Ziaii, M. (2006). Geochemical anomaly recognition using fuzzy C-means cluster analysis. WSEAS transactions on systems, 5(10), 2424-2429.

[7]- Ziaii, M., Abedi, A., & Ziaei, M. (2009). Geochemical and mineralogical pattern recognition and modeling with a Bayesian approach to hydrothermal gold deposits. Applied geochemistry, 24(6), 1142-1146.

[8]- **Ziaii**, **M.**, Pouyan, A. A., & Ziaei, M. (2009). Neuro-fuzzy modelling in mining geochemistry: identification of geochemical anomalies. Journal of Geochemical Exploration, 100(1), 25-36.

[9]- **Ziaii, M.,** Pouyan, A., & Ziaei, M. (2009). A computational optimized extended model for mineral potential mapping based on W of E method. American Journal of Applied Sciences, 6, 200-203.

[10]- **Ziaii, M.**, Soleymani, A. A., Kamkar-Rouhani, A., & Modarres, H. R. (2009). Geochemical data analysis of Deh-Salm area using neuro-fuzzy networks. Geochimica et Cosmochimica Acta Supplement, 73, A1533.

[11]- **Ziaii, M.**, Abedi, A., & Ziaei, M. (2009). Geochemical and mineralogical pattern recognition and modeling with a Bayesian approach to hydrothermal gold deposits. Applied geochemistry, 24(6), 1142-1146.

[12]- Esmaeil Zadeh A., Doulati Ardejani F., **Ziaii M.**, & Khorasani, M. (2010). Investigation of salt plugs intrusion into Dehnow anticline using image processing and geophysical magnetotelluric methods. Russian Journal of Earth Sciences, 11(3), 1-9.

[13]- **Ziaii, M.**, Abedi, A., Ziaei, M., KAMKAR, R. A., & Zendahdel, A. (2010). GIS modelling for Au-Pb-Zn potential mapping in Torud-Chah Shirin area-Iran.

[14]- Ziaei, M., **Ziaii, M.**, Kamkar A., Askari A. (2011). Application of lithogeochemistry for regional scale mapping of geothermal prospectivity in Sabalan volcano, North West of Iran. Mineralogical Magazine, 75, 2238-2292

[15]- Ziaii, M., Carranza, E. J. M., & Ziaei, M. (2011). Application of geochemical zonality coefficients in mineral prospectivity mapping. Computers & geosciences, 37(12), 1935-1945.

[16]- Gholami, R., **Ziaii, M.**, Ardejani, F., & Maleki, S. (2011). Specification and prediction of nickel mobilization using artificial intelligence methods. Open Geosciences, 3(4), 375-384.

[17]- Hosseini, A., **Ziaii, M.**, Roshandel, A. Gholami, R., & Hanachi, J. (2012). Application of artificial intelligent methods for prediction of oil reservoir porosity from seismic attributes. Iranian Journal of earth sciences.

[18]- Ziaii, M., Ardejani, F. D., Ziaei, M., & Soleymani, A. A. (2012). Neuro-fuzzy modeling based genetic algorithms for identification of geochemical anomalies in mining geochemistry. Applied geochemistry, 27(3), 663-676.

[19]- Ghiasi-Freez, J., Kadkhodaie-Ilkhchi, A., & **Ziaii**, **M.** (2012). The Application of Committee Machine with Intelligent Systems to the Prediction of Permeability from Petrographic Image Analysis and well logs Data: a case Study from the South pars gas Field, South Iran. Petroleum science and technology, 30(20), 2122-2136.

[20]- Ghiasi-Freez, J., Soleimanpour, I., Kadkhodaie-Ilkhchi, A., **Ziaii, M.**, Sedighi, M., & Hatampour, A. (2012). Semi-automated porosity identification from thin section images using image analysis and intelligent discriminant classifiers. Computers & geosciences, 45, 36-45.

[21]- Ghiasi-Freez, J., Kadkhodaie-Ilkhchi, A., & **Ziaii, M.** (2012). Improving the accuracy of flow units prediction through two committee machine models: an example from the South Pars Gas Field, Persian Gulf Basin, Iran. Computers & geosciences, 46, 10-23.

[22]- Yousefi, S., Doulati Ardejani, F., **Ziaii, M.**, Esmaeil Zadeh, E., Abedi, A., & Karamoozian, M. (2013). Identification of the origin and behaviour of arsenic in mine waste dumps using correlation analysis: a case study Sarcheshmeh copper mine. International Journal of Mining and Geo-Engineering, 47(2), 139-149.

[23]- Kadkhodaie, A., Alaei, S., **Ziaii, M.**, & Ghiasi-Freez, J. (2014). Petrophysical evaluation of Aghar shale gas by using probabilistic methods: an example from the Persian Gulf basin, South Iran. In North Sea Conference & Journal LTD.

[24]- Negahdari, A., **Ziaii, M.**, & Ghiasi-Freez, J. (2014). Application of discriminant analysis for studying the source rock potential of probable formations in the Lorestan Basin, Iran. International Journal of Mining and Geo-Engineering, 48(1), 31-54.

[25]- Navidi, A., **Ziaii**, M., Afzal, P., Yasrebi, A. B., Wetherelt, A., & Foster, P. (2014). Determination of chromites prospects using multifractal models and zonality index in the parang 1:100000 sheet, Iran. Universal Journal of Geoscience, 2, 133-139.

[26]- Ghiasi-Freez, J., **Ziaii, M.**, Kadkhodaie-Ilkhchi, A., & Honarmand, J. (2014). A reservoir rock porosity estimation through image analysis and fuzzy logic techniques. Energy Sources, Part A: Recovery, Utilization, and Environmental Effects, 36(12), 1276-1284.

[27]- Vaezian, A., **Ziaii, M.**, Kamali, M. R., & Kadkhodaie-Ilkhchi, A. (2014). Application of Thermal Modelling for Geochemical Characterization of Gadvan Formation, Persian Gulf, Iran. International Journal of Mining and Geo-Engineering, 48(2), 137-146.

[28]- Vaezian, A., **Ziaii, M.**, Kamali, M. R., & Khaleghi, M. (2014). An evaluation on geochemical characteristics of some probable source rocks of Salman oil field in the Persian Gulf. Arabian Journal for Science and Engineering, 39(7), 5653-5663.

[29]- Ghiasi-Freez, J., Honarmand-Fard, S., & **Ziaii**, **M.** (2014). The automated Dunham classification of carbonate rocks through image processing and an intelligent model. Petroleum science and technology, 32(1), 100-107.

[30]- Yousefi, S., Ardejani, F. D., **Ziaii, M.**, Abedi, A., & Zadeh, E. E. (2015). Investigating the origin and geochemical behaviour of toxic elements within the waste dumps using statistical analyses: a case study at waste dumps of Sarcheshmeh copper mine, SE of Iran. Environmental earth sciences, 73(4), 1555-1572.

[31]- Jalayeri, H., **Ziaii, M.**, & Salarirad, M. M. (2015). Zn (II) Adsorption Study onto Soils of Sarcheshmeh Copper Mine. International Journal of Mining and Geo-Engineering, 49(1), 103-111.

[32]- Salimi, A., **Ziaii, M.**, Hosseinjani Zadeh, M., Amiri, A., & Karimpouli, S. (2015). High performance of the support vector machine in classifying hyperspectral data using a limited dataset. International Journal of Mining and Geo-Engineering, 49(2), 253-268.

[33]- Yousefi, S., Ardejani, F. D., **Ziaii, M.**, & Karamoozian, M. (2015). The speciation of cobalt and nickel at mine waste dump using improved correlation analysis: a case study of Sarcheshmeh copper mine. Environment, development and sustainability, 17(5), 1065-1084.

[34]- Jalayeri, H., Salarirad, M. M., & **Ziaii**, **M.** (2016). Behavior and mechanism of various components of soil in Cu (II) adsorption from aqueous solution. Desalination and Water Treatment, 57(18), 8494-8503.

[35]- Jalayeri, H., Salarirad, M. M., & **Ziaii**, **M.** (2016). Kinetics and isotherm modelling of Zn (II) ions adsorption onto mine soils. Physicochemical Problems of Mineral Processing, 52.

[36]- Safari, S., **Ziaii, M.**, & Ghoorchi, M. (2016). Integration of singularity and zonality methods for prospectivity map of blind mineralization. International Journal of Mining and Geo-Engineering, 50(2), 189-194.

[37]- **Ziaii, M.**, Pouyan, A. A., Yousefzadeh, R., & Ghiasi-Freez, J. (2017). An Image Analysis-Based Methodology for Chromite Exploration through Opto-Geometric Parameters; a Case Study in Faryab Area, SE of Iran. International Journal of Mining and Geo-Engineering, 51(1), 97-104.

[38]- Salimi, A., **Ziaii, M.**, Amiri, A., & Zadeh, M. H. (2018). Evaluation of a Feature Subset Selection method to find informative spectral bands of Hyperion hyperspectral data for hydrothermal alteration mapping: A case study from the Darrehzar porphyry copper mine, Kerman, Iran. Journal of Economic Geology, 10(1).

[39]- Safari Sinegani, S., **Ziaii, M**., Ghoorchi, M., & Sadeghi, M. (2018). Application of concentration gradient coefficients in mining geochemistry: A comparison of copper mineralization in Iran and Canada. Journal of Mining and Environment, 9(1), 277-292.

[40]- Ghiasi-Freez, J., **Ziaii, M.**, & Moradzadeh, A. (2018). Investigating the contribution of different sizes of pore spaces to the permeability of heterogeneous carbonate rocks using Markov Chain Monte Carlo and lattice-Boltzmann simulation. Geosystem Engineering, 1-14.

[41]- Isaeva, E. R., Voroshilov, V. G., Timkin, T., & **Ziaii**, M. (2018). Geochemical criterions for identifying reservoirs and predicting their petroleum potential (Vankor field). Bulletin of the tomsk polytechnic university-geo assets engineering, 329(4), 132-141.

[42]- Abedini, M., **Ziaii, M.**, & Ghiasi-Freez, J. (2018). The application of Committee machine with particle swarm optimization to the assessment of permeability based on thin section image analysis. International Journal of Mining and Geo-Engineering, 52(2), 177-185.

[43]- Abedini, M., **Ziaii, M.**, Negahdarzadeh, Y., & Ghiasi-Freez, J. (2018). Porosity classification from thin sections using image analysis and neural networks including shallow and deep learning in Jahrum formation. Journal of Mining and Environment, 9(2), 513-525.

[44]- Ghiasi-Freez, J., **Ziaii**, M., & Moradzadeh, A. (2018). Improving reservoir rock classification in heterogeneous carbonates using boosting and bagging strategies: A case study of early Triassic carbonates of coastal Fars, south Iran. Journal of Mining and Environment, 9(4), 839-855.

[45]- Martynenko, I.V., Voroshilov, V.G., Timkin, T.V., & Ziaii, M. (2018). Petrochemical characteristics of weathering crust of the Olkhov-Chibizheksky region. News of Tomsk Polytechnic University. Engineering of georesources, 329 (12). (in Russian)

[46]- Ziaii, M., Safari, S., Timkin, T., Voroshilov, V., & Yakich, T. (2019). Identification of geochemical anomalies of the porphyry–Cu deposits using concentration gradient modelling: A case study, Jebal-Barez area, Iran. Journal of Geochemical Exploration, 199, 16-30.

[47]- Safari, S., & **Ziaii**, **M.** (2019). Evaluation of geochemical anomalies in Kerver deposit. Iranian Journal of Mining Engineering-IRJME Vol, 14(42).

[48]- Yanchenko, O.M., Voroshilov, V.G., Timkin, T.V., & **Ziaii**, **M.** (2019). Mineral-geochemical zoning of the gold-bearing weathering crusts of the Tom-Yai interfluve. Bulletin of the Tomsk Polytechnic University. Geo Assets Engineering, 330 (2), 83-94. (in Russian)

[49]- Yanchenko, O.M., Voroshilov, V.G., Timkin, T.V., Martynenko, I.V., & **Ziaii, M.** (2019). Morphology and composition of gold in the weathering crust of the Tom-Yai interfluve. Bulletin of the Tomsk Polytechnic University. Geo Assets Engineering, 330 (3). (in Russian)

Inventions

[1]- Designing and implementation software to determine the mineralization type of gold ore deposits with the use of trace element data base of minerals in GIS environment, Registered in Tehran, Iran, 2008.

[2]- Soil gas sampler in atmogeochemical method, Iran, 2017.

International Conference

[1]- **Ziaii, M.**, Abedi, A., & Safonov, Y.G. (1998). Metallogenic zoning of the east Iran, International Conference on Metallogeny and Geodynamics of the North Asian Craton and Framing Orogenic Belts, Irkutsk, Russia, (pp. 90-92).

[2]- **Ziaii, M.**, & Abedi, A. (2004). Application of GIS technology in regional exploration programs. In II international conference" GIS in Geology.

[3]- Ziaii, M., Pouyan, A. A., & Ziaii, M. (2006, July). A neuro-computing based model for anomaly recognition in geochemical exploration. In Proceedings of the 10th WSEAS International Conference on Systems, Vouliagmeni, Athens, Greece (pp. 98-102).

[4]- Ziaii, M., Kakae, R., & Abedi, A. (2007). Monitoring the environmental pollutions resulting from exploration, extraction and exploitation of mines in mining geochemistry using GIS technology. Abstract of 4th International Symposium Mineral Diversity Research and Preservation, Sofia, Bulgaria.

[5]- Ziaii, M., Pouyan, A., **Ziaei, M.**, 2007. A hybrid computational model for mineral exploration datasets. 12th IFAC Symposium Automation in Mining, Mineral, and Metal Processing, Québec City, Canada

[6]- **Ziaii**, **M.**, Abedi, A., & Ziaii, M. (2007, September). Prediction of hidden ore bodies by new integrated computational model in marginal Lut region in east of Iran. In Proc. Exploration (Vol. 7, pp. 957-961).

[7]- **Ziaii, M.**, Abedi, A., & Zendahdel, A. (2007). Trace element contents in galena and sphalerite from ore deposits of the Ggandi mineral field (Semnan Province, Northern Iran). Abstract of 4th International Symposium Mineral Diversity Research and Preservation, Sofia, Bulgaria.

[8]- Esmaeil Zadeh A., **Ziaii M.**, & Doulati Ardejani F. (2009). Application of image processing method for exploration of oil and gas in south-west Iran. International Conference on Electronic geophysical Year: State of the Art and Results, Pereslavl-Zalessky, Russia, (p. 24)

[9]- Abedini, M., **Ziaii, M**., & Ghiasi-Freez, J. (2017). Reservoir Rock Permeability Assessment Using Thin Section Image Analysis and Intelligent Systems. 2nd National Conference on Petroleum Geomechanics, Tehran, Iran. (in Persian with English abstract)

[10]- Javani, S., Negahdarzadeh, Y., Abedini, M., **Ziaii, M.**, Kadkhodaie, A., & Ghiasi-Freez, J. (2017). Identification of Carbonate Layers with Reservoir Quality Using Intelligent Models. 2nd National Conference on Petroleum Geomechanics, Tehran, Iran. (in Persian with English abstract)

[11]- Abedini., M., **Ziaii, M.**, & Ghiasi-Freez. (2017). Permeability modeling of reservoir rock using petrographic image analysis and artificial neural network and comparing with the result of NMR log. 3rd Symposium of Sedimentological Society of Iran, Tehran, Iran. (in Persian with English abstract)

[12]- Abedini., M., Shakoury, M., Ziaii, M., Pouyan, A. A., & Sohrabi, S. (2017). Textural identification of sedimentary facies of source and reservoir rocks with image analysis and neural

network, 3rd Symposium of Sedimentological Society of Iran, Tehran, Iran. (in Persian with English abstract)

Theses Under Supervision

[1]- Kamkar rajabi, A. (2003). **M.Sc. Thesis:** Analysis and interpretation of geochemical data for exploration Gazic area.

[2]- Zendehdel, A. (2007). **M.Sc. Thesis:** Spatial data integration by application of GIS for investigation of gold anomalies in Gandi, Moaleman Area, Semnan province. M.Sc. in mining exploration.

[3]- Kazemi, H. (2007). **M.Sc. Thesis:** Exploring promising areas for copper deposits in the Trood area - using remote sensing and GIS.

[4]- Bagheri Sani, M. (2007). **M.Sc. Thesis:** Investigating the production potential of acid mine drainage in tailing of Azadshahr coal mine processing factory - laboratory studies and numerical modeling.

[5]- Delijani, F. (2008). **M.Sc. Thesis:** Assessment and Monitoring model of PSEEZ air contaminants and their impacts on the atmospheric precipitation and soil resources of the region.

[6]- Farzamian, M. (2008). **M.Sc. Thesis:** Interpretation of resistivity, IP and magnetic data and combination of their results with geochemical and geological interpreted data in GIS environmental for exploration. M.Sc. in geophysics.

[7]- Yousef, S. (2008). **M.Sc. Thesis:** A GIS base weight of evidence model mineral potential mapping of copper porphyry LUT region in east of Iran. M.Sc. in mining exploration.

[8]- Shahi, H. (2008). **M.Sc. Thesis:** An integrated geochemical and geophysical study for gold of listweanite delineation. Hangaran, South Birjand.

[9]- Jalayernia, A. (2008). **M.Sc. Thesis:** A GIS based Weight-of-Evidence and Zonality Model Hybrid Mineral Potential Mapping of gold mineralization in map of 1:100000 Taherabad

[10]- Soleymani, A.A., (2008). **M.Sc. Thesis:** Geochemical data analysis of Deh-Salm area using neural and fuzzy networks. M.Sc. in mining exploration.

[11]- Gharibblok, A. (2009). **M.Sc. Thesis:** Study and investigation of application AMS method for Chromite deposits exploration (Case study: Faryab Chromite deposit).

[12]- Esmaeizadeh, A. (2009). **M.Sc. Thesis:** Presenting 2D and 3D models by use of the geophysical and image processing data in the GIS for identifying the Dehnow underground structure.

[13]- Mohamadi Champiri, S. (2009). **M.Sc. Thesis:** Assessment with of structured and alteration controls associated remote sensing and GIS in Dalli area, NW Iran.

[14]- Salimi, A. (2009). **M.Sc. Thesis:** Modeling and integration of exploration data in GIS for potential map preparation of porphyry copper deposits in 1:100000 sheet of Jebal Barez.

[15]- Ghaviandam Emamverdikhan, B. (2010). **M.Sc. Thesis:** Application of an algorithmic method based on image processing for exploration of chromite ore deposits: A case study on Faryab area.

[16]- Shakori, M. (2010). **M.Sc. Thesis:** Application of an algorithmic method based on image processing for identification facies, depositional environments petroleum source and reservoir rocks: A case study on Persian Gulf.

[17]- Darabi, A., (2010). **M.Sc. Thesis:** An integrated WofE model and geochemical zonality of copper mineralization in Parang region, east of Iran. M.Sc. in mining exploration

[18]- Mohammadi, A. (2010). **M.Sc. Thesis:** Evaluation of reservoir compaction on surface subsidence in hydrocarbon fields using synthetic aperture radar interferometry and geomechanical modeling: A case study in Dorood oil field.

[19]- Ghiasi-Freez, J. (2010). **M.Sc. Thesis:** Reservoir porosity prediction from image analysis using fuzzy clustering approaches.

[20]- Hadidi, A. (2009). **M.Sc. Thesis:** Prediction of Pb-Zn ore bodies by interpretation and spatial data integration for geophysical and geological information based on GIS models in east of Takab.

[21]- Kamali M. (2011). **M.Sc. Thesis:** Introduction and utilization of PCR molecular method as field of exploration geomicrobiology in metalic ore deposits-case study from copper reserves.

[22]- Gholampour, J. (2011). **M.Sc. Thesis:** Design and implementing a software system for extracting oil and gas reservoirs using FMI images.

[23]- Shafizadah M. (2011). **M.Sc. Thesis:** Image analyses application in FMI processing of hydrocarbon reservoir formation.

[24]- Hosseini A. (2011). **M.Sc. Thesis:** Regional study extension on Burgan reservoir in North West of Persian Gulf with base of seismic data and well logs.

[25]- Ziaei M. (2011). **M.Sc. Thesis:** Regional assessment of exploration potential for geothermal systems in the Meshkin-shahr sheet using a GIS.

[26]- Rezaei M. (2011). **M.Sc. Thesis:** Application of Satellite Remote sensing Technology for geothermal exploration in Central Iran and validation of results by regional geochemical and Aeromagnetic data. M.Sc. in mining exploration.

[27]- Alaei, S. (2012). **M.Sc. Thesis:** Petrophysical evaluation of shale gas (Dashtak formation) using probabilistic approach in Salman oil field.

[28]- Negahdari, A. (2012). **M.Sc. Thesis:** Potential mapping of gas shales reserves in one of the south west basins of Iran.

[29]- Pashang, A. (2012). **M.Sc. Thesis:** Mineral prospecting mapping of chromite in the north of Torbat-e-heydarie.

[30]- Amiri Roodbar, A. (2013). **M.Sc. Thesis:** A GIS baxse Model for Mineral Potential Mapping of Chromite deposit in Minab (SE Iran)

[31]- Javani, S. (2014). **M.Sc. Thesis:** Identification of carbonate layers with reservoir quality using intelligent model and Dunham classification.

[32]- Yousefi, S. (2014). **Ph.D. Thesis:** The new method for speciation and zonation of pollution risk due to toxic elements by GIS Case study: Sarcheshmeh porphyry copper mine.

[33]- Navidi Ghaziani, A. (2014). **M.Sc. Thesis:** Developing zonality methods by using multi-fractal modeling for metallic mineral resources exploration (case study chromite deposits, SE of Iran)

[34]- Vaezian, A. (2014). **Ph.D. Thesis:** Hydrocarbon Source Rocks evaluation using Neuro-Fuzzy by integrating well log, geochemical and seismic data.

[35]- Ehsani, R. (2014). **M.Sc. Thesis:** Modeling and integration of exploration data in GIS environment to prepare of mineral potential mapping of iron in Bastam 1:100000 sheet.

[36]- Javanbakht Shirehjini, J. (2014). M.Sc. Thesis: Deriving Lead and Zinc prospectivity map in 1:100000 Damghan sheet.

[37]- Parvardeh, H. (2014). **M.Sc. Thesis:** Using image analysis method to evaluation quantitative parameters of hematite ore. (case study: Diyan Cu-Fe mine, Semnan province).

[38]- Shayestehfard, H. (2015). **M.Sc. Thesis:** The study of relationship between geological evidences and chemical analysis of Bauxite elements with variation of thickness along the vertical direction on deposit laxyer in Jajarm Bauxite Mines.

[39]- Azizi, M. (2015). **M.Sc. Thesis:** Developing an expert model for detection of TOC rich shaly intervals using seismic attributes and neural network.

[40]- Kashefi, A. (2015). **M.Sc. Thesis:** Exploration copper-chromite deposits in Torbat heydaiyeh (Robatsefid) using the integration of geophysics, geochemistry, geological and remote sensing data in GIS environment.

[41]- Amani, M. (2015). **M.Sc. Thesis:** Evaluation and estimation geochemical anomalies of indexes copper in the North Jovein.

[42]- Jalayeri, H., (2015). **Ph.D. Thesis**: Investigation of Heavy metal Removal from Acid Mine Drainage by Natural Attenuation.

[43]- Ghanbarnezhad, R. (2015). **M.Sc. Thesis:** Recognition and Classification of Macerals for Source Rock Evaluation Through Image Analysis of Thin Sections.

[44]- Khedri, F. (2015). **M.Sc. Thesis:** Geochemical exploration of copper deposits in dian regian of Damghan.

[45]- Ziaraty Khalili, M. (2016). M.Sc. Thesis: Modeling size distribution and aggregation of asphaltene particles in the oil wells reservoir.

[46]- Jozv Khatibzadeh, A. (2016). **M.Sc. Thesis:** Simulation and investigation the effect of well type, production rate, gas recycling and gas injection on retrograde gas reservoirs production.

[47]- Razaviyan, A. (2016). **M.Sc. Thesis:** Exploration of lead and zinc deposit bassed on geology, geochemistry and geophysic data and using fuzzy logic studies in GIS software, case study: 1:100000 Damghan and Gorgan sheets.

[48]- Keshavarz Golbar, R. (2016). **M.Sc. Thesis:** Exploration of iron reserves by using local scale geochemical methods in the Chahdashi area (Nehbandan).

[49]- Abedini, M. (2017). **M.Sc. Thesis:** Reservoir Rock Permeability Assessment Using Image Analysis and Results of NMR Log in the South of Iran.

[50]- Negahdarzadeh, Y. (2017). **M.Sc. Thesis:** Pore Size Distribution of Reservoir Rock in South of Iran Using Thin Section Image Analysis.

[51]- Safari, S. (2017). **Ph.D. Thesis:** Geochemical modeling to distinguish of zone dispersed mineralization (ZDM) from blind mineralization (BM) in Urumieh-Dokhtar arc.

[52]- Heidarlaki, S. (2018). **M.Sc. Thesis:** Application of Remote Sensing and Geochemical In Order To Gold Exploration In NE Of Zarshoran.

[53]- Ghiasi-Freez, J. (2018). **Ph.D. Thesis:** Estimation of Static and Dynamic Petrophysical Properties of Carbonate Reservoir Rocks Using Thin Section Image Analysis and Simulation of Fluid Flow in Porous Media.

[54]- Khalaj, A. (2018). **M.Sc. Thesis:** Mineral potential mapping of Mn deposits using GIS and Remote sensing method in Rashm 1:100000 sheet.

[55]- Mohamadi, Z. (2018). **M.Sc. Thesis:** Exploration new polymetal deposits in the geological sheets 1:100000 Moaleman and Kalate Reshm.

[56]- Mohammadi, O. (2018). **M.Sc. Thesis:** Exploration of mextal reserves in the Sankhast area on a local scale using geochemical and remote sensing methods.

[57]- Hazariyan, H. (2018). **M.Sc. Thesis** Sequence stratigraphy analysis and reservoir quality evaluation by petroghysics logs in one of the fields in south of Iran

[58]- Salimi, A. (2019). **Ph.D. Thesis:** Using robust noise Support Vector Machine and Hyperion hyperspectral data to classify alteration zones.

Computer Skills

Languages: Visual basic, Fortran,

Software: ArcGIS 9.x, ArcGIS 8.x, ArcINFO, Arc view 3.x, Office, Surfer, Matlab,

Adobe Photoshop 8, Erdas Imagine, GPS Software, IPI2win, Didger 3, R2V, Vextractor 3,

Arc Catalog, Autodesk Map, Simulink and AutoCAD.