

List of publication for faculty members of Geophysics Program in 2016-2017

1. Zumlot, T., Batayneh, A., Zaman, H., Ghrefat, H., Mogren, S., Nazzal, Y., ... & Elwaheidi, M. (2016). Statistical analysis of different chemical elements in groundwater of northwestern Saudi Arabia. *Journal of the Geological Society of India*, 87(4), 469-475.
2. Habes Ghrefat, Mahmoud ELWAHEIDI, Awni Batayneh, Yousef Nazzal, Taisser Zumlot, Saad Mogren, 2016. Pollution assessment of arsenic and other selected elements in the groundwater and soil of the Gulf of Aqaba, Saudi Arabia. *Environ Earth Sci* (2016) 75:229 DOI 10.1007/s12665-015-5020-4.
3. Abdelbaset El-Sorogy, Sattam Almadani, and Mohammad Al-Dabbagh. Microfacies and diagenesis of the reefal limestone, Callovian Tuwaiq Mountain Limestone Formation, Central Saudi Arabia. *Journal of African Earth Sciences*, v. 115, pp. 63-70.
4. Ali K. Abdel-Fattah, S. M. Mogren, and Almadani, S. Seismicity constraints on stress regimes along Sinia Subplate Boundaries. *Studia Geophysica et Geodaetica*. 60, 268-279, DOI: 10.1007/s11200-014-0968-1
5. MK Jafri, A Lashin, E Ibrahim, M Naeem (2016): Petrophysical Evaluation of the Tensleep Sandstone Formation Using Well Logs and Limited Core Data at Teapot Dome, Powder River Basin, Wyoming, USA. *Arabian Journal for Science and Engineering* 41 (1), 223-247
6. Gabtni, H., Hajji, O., & Jallouli, C. (2016). Integrated application of gravity and seismic methods for determining the dip angle of a fault plane: Case of Mahjouba fault (Central Tunisian Atlas Province, North Africa). *Journal of African Earth Sciences*, 119, 160-170.
7. El-Waheidi, M.M., Ghrefat, H.A., Batayneh, Yousef H. Nazzal, Taisser Zumlot (2016). Integrated application of geoelectrical techniques for structural investigations: case study of Wadi Marsad Graben, Jordan. *Arab J Geosci* 9: 435. <https://doi.org/10.1007/s12517-016-2466-y>
8. Al-Amri, A., Fnais, M., Abdelrahman, K., Abdelmoneim, E., & Alqarni, H. (2016). New methods to improve the assessment of shear wave velocities and seismic hazard parameters in Jeddah city, western Saudi Arabia. *Arabian Journal of Geosciences*, 9(3), 1-15.
9. K Zaidi, S Mogren, M Mukhopadhyay, E Ibrahim (2016): Evaluation of groundwater chemistry and its impact on drinking and irrigation water quality in the eastern part of the Central Arabian graben and trough system, Saudi Arabia . *Journal of African Earth Sciences* 120, 208-219

10. Fnais, M., Ibrahim, E., Abd El-Motaal, E., Abdelrahman, K., Al-Heniedi, A., Al-Kahtany, Kh (2016): Structural Development of Northwest Saudi Arabia Using Aeromagnetic and Seismological Data. *Journal of Earth Science*, 27(6), 998–1007. doi:10.1007/S12583-016-0904-0
11. Jafri, M. K., Lashin, A., Ibrahim, E. K. H., Hassanein, K. A., Al Arifi, N., & Naeem, M. (2016). Improved reservoir characterisation using fuzzy logic platform: an integrated petrophysical, seismic structural and poststack inversion study. *Exploration Geophysics*.
12. Konrad, K., Graham, D. W., Thornber, C. R., Duncan, R. A., Kent, A. J., & Al-Amri, A. M. (2016). Asthenosphere–lithosphere interactions in Western Saudi Arabia: Inferences from $^3\text{He}/^4\text{He}$ in xenoliths and lava flows from Harrat Hutaymah. *Lithos*, 248, 339-352.
13. Duncan, R. A., Kent, A. J., Thornber, C. R., Schlieder, T. D., & Al-Amri, A. M. (2016). Timing and composition of continental volcanism at Harrat Hutaymah, western Saudi Arabia. *Journal of Volcanology and Geothermal Research*, 313, 1-14.
14. Koulakov, I., Burov, E., Cloetingh, S., El Khrepy, S., Al-Arifi, N., & Bushenkova, N. (2016). Evidence for anomalous mantle upwelling beneath the Arabian Platform from travel time tomography inversion. *Tectonophysics*, 667, 176-188.
15. Kaban, M. K., Stolk, W., Tesauro, M., El Khrepy, S., Al-Arifi, N., Beekman, F., & Cloetingh, S. A. (2016). 3D density model of the upper mantle of Asia based on inversion of gravity and seismic tomography data. *Geochemistry, Geophysics, Geosystems*, 17(11), 4457-4477.
16. Koulakov, I., Gladkov, V., El Khrepy, S., Al-Arifi, N., & Fathi, I. H. (2016). Application of repeated passive source travel time tomography to reveal weak velocity changes related to the 2011 Tohoku-Oki Mw 9.0 earthquake. *Journal of Geophysical Research: Solid Earth*, 121(6), 4408-4426.
17. Koulakov, I., Maksotova, G., Jaxybulatov, K., Kasatkina, E., Shapiro, N. M., Luehr, B. G., ... & Al-Arifi, N. (2016). Structure of magma reservoirs beneath Merapi and surrounding volcanic centers of Central Java modeled from ambient noise tomography. *Geochemistry, Geophysics, Geosystems*, 17(10), 4195-4211.
18. Zahid, A., Lashin, A., Rana, U. A., Al-Arifi, N., Ullah, I., Dionysiou, D. D., ... & Shah, A. (2016). Development of surfactant based electrochemical sensor for the trace level detection of mercury. *Electrochimica Acta*, 190, 1007-1014.
19. Dal Moro, G., Keller, L., Al-Arifi, N. S., & Moustafa, S. S. R. (2016). Shear-wave velocity profiling according to three alternative approaches: A comparative case study. *Journal of Applied Geophysics*, 134, 112-124.

20. El Khrepy, S., Koulakov, I., & Al-Arifi, N. (2016). Crustal and uppermost mantle structure beneath the continental rifting area of the Gulf of Suez from earthquake tomography. *Tectonophysics*, 668, 92-104.
21. Kaban, M. K., El Khrepy, S., Al-Arifi, N., Tesauero, M., & Stolk, W. (2016). Three-dimensional density model of the upper mantle in the Middle East: Interaction of diverse tectonic processes. *Journal of Geophysical Research: Solid Earth*, 121(7), 5349-5364.
22. Rafique, M. M., Rehman, S., Lashin, A., & Al Arifi, N. (2016). Analysis of a solar cooling system for climatic conditions of five different cities of Saudi Arabia. *Energies*, 9(2), 75.
23. Zabelina, I., Koulakov, I., Amanatashvili, I., El Khrepy, S., & Al-Arifi, N. (2016). Seismic structure of the crust and uppermost mantle beneath Caucasus based on regional earthquake tomography. *Journal of Asian Earth Sciences*, 119, 87-99.
24. Rehman, S., Baseer, M. A., Meyer, J. P., Alam, M. M., Alhems, L. M., Lashin, A., & Al Arifi, N. (2016). Suitability of utilizing small horizontal axis wind turbines for off grid loads in eastern region of Saudi Arabia. *Energy Exploration & Exploitation*, 34(3), 449-467.
25. Sychev, I., Koulakov, I., El Khrepy, S., & Al-Arifi, N. (2016). Pathways of volatile migration in the crust beneath Harrat Lunayyir (Saudi Arabia) during the unrest in 2009 revealed by attenuation tomography. *Journal of Volcanology and Geothermal Research*.
26. Chandrasekharam, D., Lashin, A., & Al Arifi, N. (2016). The potential contribution of geothermal energy to electricity supply in Saudi Arabia. *International Journal of Sustainable Energy*, 35(9), 824-833.
27. Kaban, M. K., El Khrepy, S., & Al-Arifi, N. (2016). Isostatic model and isostatic gravity anomalies of the Arabian plate and surroundings. *Pure and Applied Geophysics*, 173(4), 1211-1221.
28. Chandrasekharam, D., Lashin, A., Al Arifi, N., Al Bassam, A., Varun, C., & Singh, H. K. (2016). Geothermal energy potential of eastern desert region, Egypt. *Environmental Earth Sciences*, 75(8), 1-15.
29. Amjad, U., Lashin, A., Abbasi, R., Rana, U. A., Al-Arifi, N., Khan, G. S., ... & Shah, A. (2016). pH and Temperature Responsive Electrooxidation of Thiazole Derivatives and Preliminary Screening of Their Antioxidant Activity. *Journal of The Electrochemical Society*, 163(5), H350-H358.
30. Panjamani, A., Bajaj, K., Moustafa, S. S., & Al-Arifi, N. S. (2016). Relationship between Intensity and Recorded Ground-Motion and Spectral Parameters for the Himalayan Region. *Bulletin of the Seismological Society of America*, 106(4), 1672-1689.

31. Anbazhagan, P., Sreenivas, M., Ketan, B., Moustafa, S. S. R., & Al-Arifi, N. S. N. (2016). Selection of Ground Motion Prediction Equations for Seismic Hazard Analysis of Peninsular India. *Journal of Earthquake Engineering*, 20(5), 699-737.
32. Anbazhagan, P., Bajaj, K., Dutta, N., Moustafa, S. S., & Al-Arifi, N. S. (2017). Region-specific deterministic and probabilistic seismic hazard analysis of Kanpur city. *Journal of Earth System Science*, 126(1), 12.
33. Altun, I., Arifi, N. A., Jleli, M., Lashin, A., & Samet, B. (2016). A new concept of (α, F, d) -contraction on quasi metric space. *Journal of Nonlinear Sciences & Applications (JNSA)*, 9(5).
34. Anbazhagan, P., Uday, A., Moustafa, S. S., & Al-Arifi, N. S. (2016). Correlation of densities with shear wave velocities and SPT N values. *Journal of Geophysics and Engineering*, 13(3), 320.
35. Naeem, M., Jafri, M. K., Moustafa, S. S., AL-Arifi, N. S., Asim, S., Khan, F., & Ahmed, N. (2016). Seismic and well log driven structural and petrophysical analysis of the Lower Goru Formation in the Lower Indus Basin, Pakistan. *Geosciences Journal*, 20(1), 57-75.
36. Chandrasekharam, D., Lashin, A., Al Arifi, N., Al Bassam, A., & Varun, C. (2016). Desalination of Seawater using Geothermal Energy to Meet Future Fresh Water Demand of Saudi Arabia. *Water Resources Management*, 1-12.
37. Dal Moro, G., Al-Arifi, N. S., & Moustafa, S. S. (2016). Analysis of Rayleigh-Wave Particle Motion from Active Seismics. *Bulletin of the Seismological Society of America*.
38. Altun, I., Al Arifi, N., Jleli, M., Lashin, A., & Samet, B. (2016). A New Approach for the Approximations of Solutions to a Common Fixed Point Problem in Metric Fixed Point Theory. *Journal of Function Spaces*, 2016.
39. Moustafa, S. S., Al-Arifi, N. S., Jafri, M. K., Naeem, M., Alawadi, E. A., & Metwaly, M. A. (2016). First level seismic microzonation map of Al-Madinah province, western Saudi Arabia using the geographic information system approach. *Environmental Earth Sciences*, 75(3), 1-20.
40. Altun, I., Al Arifi, N., Jleli, M., Lashin, A., & Sametd, B. (2016). Feng-Liu type fixed point results for multivalued mappings on JS-metric spaces. *Journal of Nonlinear Sciences & Applications (JNSA)*, 9(6).
41. Dal Moro, G., Al-Arifi, N., & Moustafa, S. S. (2016). ASSESSING GROUND COMPACTION VIA TIME LAPSE SURFACE WAVE ANALYSIS. *Acta Geodynamica et Geomaterialia*, 13(3), 249-256.

42. Altun, I., Al Arifi, N., Jleli, M., Lashin, A., & Samet, B. (2016). A FIXED POINT THEOREM FOR JS-CONTRACTION TYPE MAPPINGS WITH APPLICATIONS TO POLYNOMIAL APPROXIMATIONS. *FILOMAT*.
43. Nazzal, Y., Zaidi, F. K., Abuamarah, B. A., Ahmed, I., Howari, F. M., Naeem, M., ... & Al-Kahtany, K. M. (2016). Evaluation of metals that are potentially toxic to agricultural surface soils, using statistical analysis, in northwestern Saudi Arabia. *Environmental Earth Sciences*, 75(2), 171.
44. Panjamani, A., Manohar, D. R., Moustafa, S. S., & Al-Arifi, N. S. (2016). Selection of Shear Modulus Correlation for SPT N Values based on Site Response Studies. *Journal of Engineering Research*, 4(3).
45. Nazar, M. F., Azeem, W., Rana, U. A., Ashfaq, M., Lashin, A., Al-Arifi, N., ... & Mahmood, A. (2016). pH-dependent probing of levofloxacin assimilated in surfactant mediated assemblies: Insights from photoluminescent and chromatographic measurements. *Journal of Molecular Liquids*, 220, 26-32.
46. Abouad, E., Moustafa, S. S., & Al-Arifi, N. S. (2016). Active tectonic trends and crustal modeling of the eastern Mediterranean Sea deduced from geophysical data. *Environmental Earth Sciences*, 75(12), 1-13.
47. Abdelbaset S. El-Sorogy, Mohamed Tawfik, Sattam A. Almadani, and Abdullah Attiah. Assessment of toxic metals in coastal sediments of the Rosetta area, Mediterranean Sea, Egypt. *Environ Earth Science*, 75:398. DOI 10.1007/s12665-015-4985-3.
48. Tawfiek, A. M., Guanzheng, T. A. N., Hafez, A. G., Al-Amri, A., Alarif, N., & Abdelrahman, K. (2016). Automatic identification of fake patterns caused by short-width wavelets in seismic data. *Arabian Journal of Geosciences*, 9(11), 580.
49. Konrad, K., Graham, D.W., Thornber, C.R., Duncan, R.A., Kent, A.J.R., & Al-Amri, A. Asthenosphere-Lithosphere Interactions in Western Saudi Arabia: Inferences from $^3\text{He}/^4\text{He}$ in Xenoliths and Lava Flows from Harrat Hutaymah, *Lithos*, 248–251, 339–352. (2016).
50. Gok, Rengin , Ayoub Kaviani, Eric Matzel, Michael Pasyanos, Kevin Mayeda, Gurban Yetirmishli, Issa El-Hussain, Abdullah Al-Amri, Farah Al-Jeri, Tea Godoladze, Dogan Kalafat, Eric Sandvol, and William R. Walter. Moment Magnitudes of Local/Regional Events from 1D Coda Calibrations in the Broader Middle East Region. *Bulletin of the Seismological Society of America*, Vol. 106, No. 5, pp. –, October 2016, doi: 0.1785/0120160045. (2016).