

**Geology and Geophysics Faculty Publication List in ISI Journals between September 2019 and August 2020**

1. Abdelfattah, A.K., Al-amri, A., Soliman, M.S., Zaidi, F.K., Qaysi, S., Fnais, M., Almadani, S. and Al-Arifi, N., 2020. An analysis of a moderate earthquake, eastern flank of the Red Sea, Saudi Arabia. *Earth, Planets and Space*, 72(1), pp.1-17. GPY/GEO
2. Abdelfattah, A.K., Jallouli, C., Qaysi, S. and Al-Qadasi, B., 2020. Crustal Stress in the Northern Red Sea Region as Inferred from Seismic b-values, Seismic Moment Release, Focal Mechanisms, Gravity, Magnetic, and Heat Flow Data. *Surveys in Geophysics*, 41(5), pp.963-986. GPY
3. Abdelrahman, K., Alamri, A.M., Al-Otaibi, N. and Fnais, M., 2020. Geotechnical assessment for the ground conditions in Makah Al-Mukarramah city, Saudi Arabia. *Journal of King Saud University-Science*. GPY
4. Abu Amarah, B.A., Azer, M.K., Asimow, P.D., Ghrefat, H. and Mubarak, H.S., 2019. Geochemistry and petrogenesis of late Ediacaran rare-metal albite granites of the Arabian-Nubian Shield. *Acta Geologica Sinica-English Edition*. GEO
5. Abu Amarah, B.A., Azer, M.K., Asimow, P.D., Ghrefat, H. and Mubarak, H.S., 2019. Geochemistry and petrogenesis of late Ediacaran rare-metal albite granites of the Arabian-Nubian Shield. *Acta Geologica Sinica-English Edition*. GEO
6. Abuamarah, B.A., 2020. Genesis and Petrology of Postcollisional Rare-Metal-Bearing Granites in the Arabian Shield: A Case Study of Aja Ring Complex, Northern Saudi Arabia. *The Journal of Geology*, 128(2), pp.131-156. GEO
7. Abuamarah, B.A., 2020. Petrogenetic evolution of Cryogenian Halaban ophiolite, Saudi Arabia: A fragment of fore-arc oceanic lithosphere mantle. *Lithos*, 356, p.105303. GEO
8. Abuamarah, B.A., Asimow, P.D., Azer, M.K. and Ghrefat, H., 2020. Suprasubduction-zone origin of the podiform chromitites of the Bir Tuluah ophiolite, Saudi Arabia, during Neoproterozoic assembly of the Arabian Shield. *Lithos*, 360, p.105439. GEO
9. Abuamarah, B.A., Nabawy, B.S., Shehata, A.M., Kassem, O.M. and Ghrefat, H., 2019. Integrated geological and petrophysical characterization of oligocene deep marine unconventional poor to tight sandstone gas reservoir. *Marine and Petroleum Geology*, 109, pp.868-885. GEO
10. Adegoke, A.K., Hakimi, M.H., Abdullah, W.H., Ibrahim, E.K., Yandoka, B.M.S., Al Faifi, H. and Lashin, A., 2020. Geochemistry and oil-gas generation modeling of the Late Cretaceous shales from the Chad (Bornu) Basin, Northeast Nigeria. *Journal of Natural Gas Science and Engineering*, p.103341. GEO
11. Ahmad, F., Baioumy, H., Farouk, S., Al-Kahtany, K., El-Sorogy, A. and Kirk, J., 2020. Geochemistry and stable isotopes of the upper Campanian-lower Maastrichtian phosphorite-bearing sequence, Central Jordan: Implications for their age, origin, and diagenesis. *Geological Journal*, 55(6), pp.4453-4468. GEO

12. Ahmed, S., Khurshid, S., Madan, R., Amarah, B.A.A. and Naushad, M., 2020. Water quality assessment of shallow aquifer based on Canadian Council of Ministers of the environment index and its impact on irrigation of Mathura District, Uttar Pradesh. *Journal of King Saud University-Science*, 32(1), pp.1218-1225. GEO
13. Al-Amri, A.M., Abdelrahman, K., Mellors, R. and Harris, D., 2020. Seismic identification of geothermal prospecting in Harrat Rahat, Northern Arabian Shield. *Arabian Journal of Geosciences*, 13, pp.1-7. GPY
14. Alamri, A.M., Bankher, A., Abdelrahman, K., El-Hadidy, M. and Zahran, H., 2020. Soil site characterization of Rabigh city, western Saudi Arabia coastal plain, using HVSR and HVSR inversion techniques. *Arabian Journal of Geosciences*, 13(2), pp.1-16. GPY
15. Alarifi, S.S., Kellogg, J.N. and Ibrahim, E., 2020. Corrigendum to "Gravity, aeromagnetic and electromagnetic study of the gold and pyrite mineralized zones in the Haile Mine area, Kershaw, South Carolina". *Journal of Applied Geophysics*, 178, p.104044. GEO
16. Alfaifi, H., Kahal, A., Albassam, A., Ibrahim, E., Abdelrahman, K., Zaidi, F. and Alhumidan, S., 2019. Integrated geophysical and hydrochemical investigations for seawater intrusion: a case study in southwestern Saudi Arabia. *Arabian Journal of Geosciences*, 12(12), p.372. GPY
17. Al-Gain, M., Abdelrahman, K., Kahal, A., Al-Zahrani, S., Ibrahim, E. and Al-Otaibi, N., 2020. Impact of 5D regularization and interpolation on subsurface imaging: A case study of Stratton field, South Texas, United States of America. *Journal of King Saud University-Science*, 32(6), pp.2733-2740. GEO/GPY
18. Al-Kahtany, K., Youssef, M., El-Sorogy, A. and Al-Kahtany, F., 2020. Benthic foraminifera as bioindicators of environmental quality of Dammam Al-Jubail area, Arabian Gulf, Saudi Arabia. *Arabian Journal of Geosciences*, 13, p.427. GEO
19. Al-Khafaji, A.J., Hakimi, M.H., Ibrahim, E.K., Najaf, A.A., Al Faifi, H. and Lashin, A., 2020. Organic geochemistry of oil seeps from the Abu-Jir Fault Zone in the Al-Anbar Governorate, western Iraq: Implications for early-mature sulfur-rich source rock. *Journal of Petroleum Science and Engineering*, 184, p.106584. GEO
20. Almadani, S.A., 2020. Crustal characteristics beneath the Tien Shan belt, Central Asia, using the seismic receiver function. *Journal of King Saud University-Science*. GPY
21. Alshehri, F., Sultan, M., Karki, S., Alwagdani, E., Alsefry, S., Alharbi, H., Sahour, H. and Sturchio, N., 2020. Mapping the Distribution of Shallow Groundwater Occurrences Using Remote Sensing-Based Statistical Modeling over Southwest Saudi Arabia. *Remote Sensing*, 12(9), p.1361. GEO
22. Aminov, J., Koulakov, I., Jakovlev, A., Zhao, J., El-Khrepy, S., Aminov, J., Al Arifi, N., Aminov, J. and Mamadjanov, Y., 2020. Directions of lithosphere interactions in the Pamir–Hindu Kush junction inferred from anisotropic tomography. *Canadian Journal of Earth Sciences*, 57(5), pp.601-616. GPY
23. Anbazhagan, P., Bajaj, K., Matharu, K., Moustafa, S.S. and Al-Arifi, N.S., 2019. Probabilistic seismic hazard analysis using the logic tree approach–Patna district (India). *Natural Hazards and Earth System Sciences*, 19(10), pp.2097-2115. GPY

24. Baioumy, H., Lehmann, B., Salim, A.M.A., Al-Kahtany, K. and El-Sorogy, A., 2020. Geochemical characteristics of black shales from Triassic turbidites, Peninsular Malaysia: Implications for their origin and tectonic setting. *Marine and Petroleum Geology*, 113, p.104137. GEO
25. Bushenkova, N., Koulakov, I., Senyukov, S., Gordeev, E.I., Huang, H.H., El Khrepy, S. and Al Arifi, N., 2019. Tomographic images of magma chambers beneath the Avacha and Koryaksky volcanoes in Kamchatka. *Journal of Geophysical Research: Solid Earth*, 124(9), pp.9694-9713. GPY
26. Chandrasekharam, D., Lashin, A., Al Arifi, N., Al-Bassam, A.M. and Chandrasekhar, V., 2020. Geothermal energy for sustainable water resources management. *International Journal of Green Energy*, 17(1), pp.1-12. GEO/GPY
27. Chandrasekharam, D., Lashin, A., Al Arifi, N., Al-Bassam, A.M. and Varun, C., 2019. Geothermal energy for desalination to secure food security: case study in Djibouti. *Energy, Sustainability and Society*, 9(1), pp.1-11. GEO/GPY
28. Dal Moro, G., Al-Arifi, N. and Moustafa, S.R., 2019. On the efficient acquisition and holistic analysis of Rayleigh waves: Technical aspects and two comparative case studies. *Soil Dynamics and Earthquake Engineering*, 125, p.105742. GPY
29. Elgendi, N.T., Abuamarah, B.A., Nabawy, B.S., Ghrefat, H. and Kassem, O.M., 2020. Pore fabric anisotropy of the cambrian–ordovician Nubia sandstone in the onshore Gulf of Suez, Egypt: a surface outcrop analog. *Natural Resources Research*, 29(2), pp.1307-1328. GEO
30. El-Sorogy, A.S., Demircan, H. and Alharbi, T., 2020. Gastrochaenolites ichnofacies from intertidal seashells, Al-Khobar coastline, Saudi Arabia. *Journal of African Earth Sciences*, 171, p.103943. GEO
31. El-Sorogy, A.S., Youssef, M. and Al-Malky, M., 2020. Late Pleistocene reef fauna from the Red Sea coast, Northwest Saudi Arabia. *Historical Biology*, 32(7), pp.996-1009. GEO
32. El-Sorogy, A.S., Youssef, M., Al-Kahtany, K. and Saleh, M.M., 2020. Distribution, source, contamination, and ecological risk status of heavy metals in the Red Sea-Gulf of Aqaba coastal sediments, Saudi Arabia. *Marine Pollution Bulletin*, 158, p.111411. GEO
33. Elwaheidi, M.M., 2020. Geophysical Imaging of a Buried Tertiary Valley Aquifer in an Arid Region Using Time Domain Electromagnetic Method. *Journal of Geoscience and Environment Protection*, 8(7), pp.195-206. GPY
34. Farouk, S., Aaskalany, M., El-Sorogy, A., Youssef, M. and Taha, S., 2020. Maastrichtian-early Paleocene foraminiferal palaeobathymetry and depositional sequences at Gebel El Sharawna, south Luxor, Egypt. *Lethaia*, 53(3), pp.316-331. GEO
35. Gahlan, H.A., Azer, M.K., Asimow, P.D. and Al-Kahtany, K.M., 2020. Petrogenesis of gold-bearing listvenites from the carbonatized mantle section of the Neoproterozoic Ess ophiolite, Western Arabian Shield, Saudi Arabia. *Lithos*, 372, p.105679. GEO
36. Gahlan, H.A., Azer, M.K., Asimow, P.D. and Al-Kahtany, K.M., 2020. Genesis and geodynamic evolution of serpentинized ultramafics and associated magnesite

- deposits in the Al-Wask ophiolite, Arabian Shield, Saudi Arabia. American Journal of Science, 320(3), pp.236-279. GEO
37. Gahlan, H.A., Azer, M.K., Asimow, P.D., Mubarak, H.S. and Al-Kahtany, K.M., 2020. Petrological characteristics of the Neoproterozoic Ess ophiolite mantle section, Arabian Shield, Saudi Arabia: a mineral chemistry perspective. International Journal of Earth Sciences, 109(1), pp.239-251. GEO
38. Gameil, M., El-Sorogy, A.S. and Al-Kahtany, K., 2020. Solitary corals of the Campanian Hajajah Limestone Member, Aruma Formation, Central Saudi Arabia. Historical Biology, 32(1), pp.1-17. GEO
39. Hakimi, M.H., Abdullah, W.H., Al Faifi, H.J., Mustapha, K.A., Kahal, A.Y. and Lashin, A.A., 2020. Source rock evaluation and hydrocarbon generation potential of Mid-Late Cretaceous sediments from Mintaq-01 well in the Wadi Hajar of Southern Sabatayn Basin, Yemen. Petroleum Science and Technology, 38(3), pp.216-224. GEO
40. Hakimi, M.H., Abdullah, W.H., Lashin, A.A., Ibrahim, E.K.H. and Makeen, Y.M., 2020. Hydrocarbon generation potential of the organic-rich Naifa Formation, Say'un-Masila Rift Basin, Yemen: insights from geochemical and palynofacies analyses. Natural Resources Research, 29(4), pp.2687-2715. GPY
41. Hakimi, M.H., Ahmed, A., Kahal, A.Y., Hersi, O.S., Al Faifi, H.J. and Qaysi, S., 2020. Organic geochemistry and basin modeling of Late Cretaceous Harshiyat Formation in the onshore and offshore basins in Yemen: Implications for effective source rock potential and hydrocarbon generation. Marine and Petroleum Geology, p.104701. GEO/GPY
42. Hakimi, M.H., Ahmed, A., Mogren, S., Shah, S.B.A., Kinawy, M.M. and Lashin, A.A., 2020. Thermogenic gas generation from organic-rich shales in the southeastern Say'un-Masila Basin, Yemen as demonstrated by geochemistry, organic petrology, and basin modeling. Journal of Petroleum Science and Engineering, p.107322. GPY
43. Hakimi, M.H., Kahal, A.Y., Ahmed, A. and Al Faifi, H.J., 2020. Organic geochemistry of Late Cretaceous Mukalla shales from the Mukalla-Sayhut Basin, Southern Yemen—terrestrial organic matter inputs and gas-resource potential. Arabian Journal of Geosciences, 13(19), pp.1-17. GEO
44. Howari, F.M., Ghrefat, H., Nazzal, Y., Galmed, M.A., Abdelghany, O., Fowler, A.R. and Sharma, M., 2020. Delineation of Copper Mineralization Zones at Wadi Ham, Northern Oman Mountains, United Arab Emirates Using Multispectral Landsat 8 (OLI) Data. Frontiers in Earth Science, 8, p.417. GEO
45. Kahal, A., El-Sorogy, A.S., Qaysi, S., Almadani, S., Kassem, O.M. and Al-Dossari, A., 2020. Contamination and ecological risk assessment of the Red Sea coastal sediments, southwest Saudi Arabia. Marine Pollution Bulletin, 154, p.111125. GEO/GPY
46. Kahal, A.Y., El-Sorogy, A.S., Alfaifi, H.J., Almadani, S. and Kassem, O.M., 2020. Biofacies and diagenetic alterations of the Pleistocene coral reefs, northwest Red Sea coast, Saudi Arabia. Geological Journal, 55(2), pp.1380-1390. GEO/GPY
47. Khalil, A.R. and Al-Arifi, N.S., 2019. Focal mechanisms overview. Earth Science Informatics, 12(3), pp.381-388. GPY

48. Liu, L., Tong, S., Li, S. and Qaysi, S., 2020. Sp Receiver-Function Images of African and Arabian Lithosphere: Survey of Newly Available Broadband Data. *Seismological Research Letters*, 91(3), pp.1813-1819. GPY
49. Mogren, S., 2020. Engineering bedrock depth estimation and ground response analysis of the northern Jeddah urban area, western Saudi Arabia. *Journal of King Saud University-Science*. GEO
50. Mogren, S., 2020. Integrated use of electrical resistivity tomography and ground penetration radar for identifying subsurface sinkholes in Rufa Graben, Central Riyadh. *Arabian Journal of Geosciences*, 13(1), pp.1-16. GPY
51. Mogren, S., Aldahri, M., Abdelrahman, K. and Zahran, H., 2020. Near-surface foundation level assessment from seismic measurements: a case study of north Jeddah City, Saudi Arabia. *Arabian Journal of Geosciences*, 13(5), pp.1-13. GPY
52. Mukhopadhyay, M., Elawadi, E., Mukhopadhyay, B., Venkatesh, K.D. and Al-Arifi, N., 2020. Geophysical constraints on a modified crust below the Rayn Anticlines, Eastern Saudi Arabia. *Journal of Asian Earth Sciences*, 188, p.104105. GPY
53. Mukhopadhyay, M., Mogren, S., Mukhopadhyay, B., Venkatesh, K.D. and Elawadi, E., 2020. Crustal control on basement uplift beneath the Ghawar Anticline, Saudi Arabia—gravity modeling with receiver function constraints. *Arabian Journal of Geosciences*, 13(12), pp.1-17. GPY
54. Musaed, H.A., Al-Bassam, A.M., Zaidi, F.K., Alfaifi, H.J. and Ibrahim, E., 2020. Hydrochemical assessment of groundwater in mesozoic sedimentary aquifers in an arid region: a case study from Wadi Nisah in Central Saudi Arabia. *Environmental Earth Sciences*, 79(6), pp.1-12. GEO/GPY
55. Nabawy, B.S., Ibrahim, E.H., Kahal, A., Alfaifi, H.J. and Lashin, A.A., 2020. Impact of authigenic iron oxides, clay content and grain size on the aquifer quality properties of the Cambrian-Ordovician Wajid Sandstone, southwest Saudi Arabia. *Journal of African Earth Sciences*, p.104000. GPY/GEO
56. Nour, H.E. and El-Sorogy, A.S., 2020. Heavy metals contamination in seawater, sediments and seashells of the Gulf of Suez, Egypt. *Environmental Earth Sciences*, 79, p.274. GEO
57. Petrunin, A.G., Kaban, M.K., El Khrepy, S. and Al-Arifi, N., 2020. Mantle Convection Patterns Reveal the Mechanism of the Red Sea Rifting. *Tectonics*, 39(2), p.e2019TC005829. GPY
58. Sahour, H., Vazifedan, M. and Alshehri, F., 2020. Aridity trends in the Middle East and adjacent areas. *Theoretical and Applied Climatology*, pp.1-16. GEO
59. Youssef, M., El-Sorogy, A., Osman, M., Ghandour, I. and Manaa, A., 2020. Distribution and metal contamination in core sediments from the North Al-Wajh area, Red Sea, Saudi Arabia. *Marine Pollution Bulletin*, 152, p.110924. GEO
60. Youssef, M., Madkour, H., El Attar, R., Mansour, A. and Badawi, A., 2020. Assessment of metal contamination in coastal marine sediments of Makadi Bay on the Red Sea, Egypt. *Marine and Freshwater Research*, 71(10), pp.1241-1251. GEO