

Overview

1. Personal data

Full Name

Fernando Acácio Monteiro Santos

Name under which you publish

Fernando Acácio Monteiro Santos

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Birth date

14-03-1954

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Work address

Universidade de Lisboa-Instituto Dom Luís-Laboratório Associado
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2. Academic degrees

Year: 1994

Degree: DOUTORAMENTO

Final grade: Com Distinção e LAUDE

Degree granting institution Universidade de Lisboa

School/College/Campus Faculdade de Ciências

Thesis title Aplicação dos métodos da resistividade e magneto-telúrico ao estudo de campos geotérmicos

Supervisor: Prof. Doutor António Roque Andrade Afonso

Co-supervisor:

Scientific area Geofísica

Program title Física

Year: 2003

Degree: AGREGAÇÃO

Final grade: Distinção

Degree granting institution Universidade de Lisboa

School/College/Campus Faculdade de Ciências

Thesis title

Supervisor:

Co-supervisor:

Scientific area

Program title

3. Previous activity and current status

Período

Cargo, categoria ou actividade

Instituição

a Prof. Auxiliar/Assistant Prof.

Universidade de Lisboa

a Assistente /Assistant

Universidade de Lisboa

4. Area of scientific activity

Applied Geophysics: Gravity and Electromagnetic methods. Hydrogeology and natural phenomena monitoring. Modelling and Inverse Problem. Rock Properties.

5. Present research interest

Domain of specialization

Geo-electromagnetics. Inverse Problem.

Current research interests

Use of electromagnetic methods (resistivity, magnetotelluric and transient) to investigate shallow and deep earth structures. Joint inversion of complementary geophysical data.

Other professional interests/activities

Former Associated Editor of Geophysical Prospecting;

Member of the Revista de Geologia da Universidade Federal do Ceará;

Member of the Editorial Board of ISRN Geophysics Journal

Referee for:

Geophysics
Geophysical Propecting
Tectonophysics
Tectonics
Earth Planets Space
Journal of Volcanology and Geothermal Research
Journal of Applied Geophysics
Near Surface Geophysics
Indian Journal of Marine Sciences
Publicações do Instituto Geológico e Mineiro

6. Experience as scientific adviser

- Supervising of seven PhD students.
- Supervising of four MsC students.
- Supervising of three Post-Doc.

7. Participation in R&D projects

Participação em projectos de investigação (coordenador/membro de equipas)

1986-1988 (as a member) - Aplicação da prospecção geoelectrica a meios cárnicos.
Use of the resistivity method in karst regions. Funded by JNICT.

1990-1992 (as a member)- Avaliação dos recursos geotérmicos entre Lamego e Vila Verde da Raia. Evaluation of the geothermal potential between Lamego and Vila Verde da Raia. Projec funded by C.E.(DGXII). Coordinators: Professores Doutores Luís Mendes Victor e Aires de Barros.

1993-1994 (as a member)- European Laboratory Volcanoes. Piton de la Fournaise: definition of the fine structure and the plumbing system aimed at eruption prediction, hazard, assessment and eruptive mechanism understandings (subsidiado pela CE).
Coordinator: Dr. Jacques Zlotnicki (CNRS, França).

1992-1995 (as a member)- Models for Hydrothermal Circulation-Applocation to the Chaves region - Programa STRIDE.

1997-1999 (coordinator) - MTVILA- Magnetotelluric studies in Vilariga fault.(FCT/SPP-C/C/CTA/2123/95).

1998-2000 (as a member)- AQUATRANSFER- Heat and mass transfer by hydrothermal circulation in granite (PRAXIS-3/3.1/CEG/266/95). Coordinator: Prof. Doutor Alberto Mendes Victor.

1998-2001 (as a member)- ISO-3D - Applications of 3-dimensional Electromagnetic Induction by Sources in the Ocean (Financiado pela CE; MAST III-MAS3-CT97-0120). Coordinator: Prof. Martin Sinha (Universidade de Southampton).

1999-2001 (as a member)- DIWASTE – Circulação de Fluidos em Rochas Fracturadas e Implicações para a Definição de Critérios de Armazenamento de Resíduos.(PRAXIS/P/CTE/11028/1998). Coordinator: Dr. António Mateus.

2000-2003 (as a member) - PROTEU – Advanced technologies for monitoring estuaries and coastal environments. FCT (Financiado pela FCT). Coordinator: Prof. Doutor José Luís dos Santos (INESC/PORTO).

2001-2003 (as a member) – STAMINA- Study of the Tectonic and Magmatic Interplay in the Azores (Financiado pela FCT). Coordinator. Dr. Jorge Miguel Miranda.

2002-2004 (coordinator) – VAMEM- Electromagnetic monitoring of the volcanic activity (FCT-POCTI/CTA/39834/2001)).

2003-2005 (as a member) – MODELWASTE - Modelação da dispersão de poluentes em torno de lixeiras e aterros sanitários: estudo mineralógico, hidrogeológico e químico.(FCT- POCTI/CTA/43390/2001). Coordinator: Dr. Jorge Figueiras.

2005-2007 (coordinator)- EMNOCM-ElectroMagnetic Network for Oceanic Current Monitoring (POCTI/CTA/44062/2002).

2005-2008 (as a member)- HIMOCATCH - Papel das Áreas Montanhosas na Recarga de Recursos Hídricos - Norte de Portugal (POCTI/CTA/44235/02). Inv. Principal: José Manuel Marques (IST).

2005/09 (coordinator)– HYDROARID – Avaliação do potencial hidrogeológico e monitorização da intrusão salina em áreas semi-áridas usando uma aproximação multidisciplinar. (POCI/CTEGEX/55399/2004).

2007-2009 (as a member) - AMDRAPHID- Advanced Monitoring and Diagnostics of Ria de Aveiro Physical Dynamics POCTI/AMB/57928/2004. PI: Prof. Dr. João Dias (U.Aveiro)

2007-2009 (as a member) - Modelo Geoeléctrico de la Litosfera Castellano-Extremeña: Perfil Magnetotelúrico MT-Alcudia (MT-ALCUDIA, Spanish Agency of Science and Technology – Investigador Principal: Prof. Jaume Pous (Univ. de Barcelona).

2010-2012- CHAVESMT- Estudos de Magneto-telúrica em Chaves-FCT

Since 1997 (as a member).....EUROPROBE/IBERIA – Magnetotelluric studies in the Ossa Morena Zone.

8. Prizes and awards received

Year

Name of the prize or award

Promoting entity

9. Published works

Teses

Prospecção geoeléctrica em Meios cársicos-Aplicação ao Maciço Calcário Estremenho-PAPCC (equivalência a Mestrado),FCUL, 1989, 140 p.

Interpretação Integrada de Dados de Resistividade e Magneto-Telúrica- Aplicação ao Estudo de Reservatórios Geotérmicos de Baixa Entalpia - Tese Doutoramento, 1994, FCUL, 240 p.

Capítulos de livros

Monteiro Santos, F.A., Dupis, A., Andrade Afonso, A.R e Mendes Victor, L.A., 1999. Three-Dimensional modeling of a magnetotelluric survey over Chaves graben in northeast Portugal. Artigo incluído no livro 3-D Electromagnetic Methods (Oristaglio, M. and Spies, B. Ed.), Society of Exploration Geophysicists, USA.

Correia, A., Ramalho, E., Rodrigues da Silva, A. M., Mendes-Victor, L. M., Duque, M. R., Aires-Barros, L., Marques, J. M., Santos, F.A.M. and Aumento, F. (2002) – Portugal – In: Atlas of Geothermal Resources in Europe (Eds: Suzanne Hurter and Ralph Haenel), GGA, Hannover, Germany. 92p., 89 plates. pp.47-49. ISBN92-828-0999-4.

Marques, J.M., Carreira, P.M., Espinha Marques, J., Chaminé H.I., Fonseca, P.E., Monteiro Santos, F.A., Almeida, E.P., Gonçalves, R., Almeida,P.G., Gomes, A., Teixeira, J., Carvalho,J. and Rocha, F.T., 2008. Role of high mountain areas in catchment hydromineral resources, Northern/Central Portugal: environmental issues. In: Prats Rico, D., Brebia, C.A. and Villacampa Esteve, Y., Ed., Water Pollution IX. WIT Transactions on Ecology and the Environment, WIT Press, Southampton, UK, Volume 111, 95-104. (ISBN: 978-1.84564-115-3).

Carreira, P.M., Marques, J.M., Pina, A., Mota Gomes, A., Nunes, D. and Monteiro Santos, F.A., 2008. Characterization of groundwater resources degradation at Santiago Island (Cabo Verde) ascribed to isotopic and geochemical signatures. In: Prats Rico, D., Brebia, C.A. and Villacampa Esteve, Y., Ed., Water Pollution IX. WIT Transactions on Ecology and the Environment, WIT Press, Southampton, UK, Volume 111, 139-148. (ISBN: 978-1.84564-115-3).

Artigos em revistas de circulação internacional com arbitragem científica

1. Monteiro Santos, F.A., Dupis, A., Andrade Afonso, A.R e Mendes Victor, L.A., 1995 Magnetotelluric Observations over the Chaves geothermal field (NE Portugal)- Preliminary results. *Physics of the Earth and Planetary Interiors*, 91: 203-211.
2. Monteiro Santos, F.A., Dupis, A., Andrade Afonso, A.R e Mendes Victor, L.A., 1996. An audio-magnetotelluric survey over the Chaves geothermal field (NE Portugal). *Geothermics*, 25 (3), 389-406.
3. Almeida, E.P., Monteiro Santos, F.A. e Mendes-Victor, L.A., 1996. The structure of the upper crust in the South Portuguese Zone from magnetotelluric studies. Preliminary results. *Acta Geod. Geoph. Mont. Hung.*, V. 31, 217-229.
4. Monteiro Santos, F. A., Dupis, A., Andrade Afonso, A.R. and L. A. Mendes-Victor, 1997. 1D joint inversion of AMT and resistivity data acquired over a graben. *Journal of Applied Geophysics*, 38, 115-129.
5. Monteiro Santos, F. A., Andrade Afonso, A.R. and L. A. Mendes-Victor, 1997. Study of the Chaves geothermal field using 3D resistivity modeling. *Journal of Applied Geophysics*, 37, 85-102.
6. Duque, R., Monteiro Santos, F.A., Mendes-Victor, L.A., 1998. Heat flow and deep temperatures in the Chaves Geothermal system, northern Portugal. *Geothermics*, 27 (1), 75-87.
7. Monteiro Santos, F.A., Pous, J., Almeida, E., Queralt, P., Marcuello, A., Matias, H. and Mendes-Victor, L.A., 1999. Electrical conductivity of the crust across the Ossa Morena and South Portuguese Zone suture-Preliminary results. *Tectonophysics*, 313, 449-462.
8. Monteiro Santos, F.A. and Mendes-Victor, L.A., 2000. 1D anisotropy versus 2D isotropic media in magnetotellurics. *Acta Geod. Geoph. Mont. Hung.*, V. 35 (1), 49-61.
9. Monteiro Santos, F.A., Almeida, E., Mateus, A., Matias, H., Matos, L. and Mendes-Victor, L.A., 2000. Magnetotelluric study of a Plio-Quaternary tectonic depression: the Vilarica basin (NE Portugal). *Journal of Applied Geophysics*, 44, 1-14.
10. Almeida, E.P., Pous, J., Monteiro Santos, F.A., Fonseca, P., Marcuello, A., Queralt, P., Nolasco, M.R. and Mendes-Victor, L.A., 2001. Electromagnetic imaging of a transpressional tectonic in SW Iberia. *Geophysical Research Letters*, 28, 3, 439-442.
11. Monteiro Santos, F.A., Nolasco, M.R., Almeida, E.P., Pous, J. and Mendes-Victor,

L.A., 2001. Coast effects on magnetic and magnetotelluric transfer functions and their correction: application to MT soundings carried out in SW Iberia. *Earth and Planetary Science Letters*, V. 186, 2, 283-295.

12. Monteiro Santos, F.A., Matias, H. and Gonçalves, R., 2001. The use of the EM34 technique in cave detection. *European Journal Environmental Engineering Geophysics*, 6, 153-166.

13. J. M. Marques, Monteiro Santos, F.A., R. C. Graça, R. Castro, L. Aires-Barros & L. A. Mendes Victor, 2001. A geochemical and geophysical approach to derive a conceptual circulation model of CO₂-rich mineral waters: a case study of Vilarelho da Raia, northern Portugal. *Hydrogeology Journal*, 9, 584-596.

14. Monteiro Santos, F.A., Matos, L., Almeida, E., Matias, H., Mateus, A. and Mendes-Victor, L.A., 2002. Three-dimensional magnetotelluric modelling of the Vilariça depression (NE Portugal). *Journal of Applied Geophysics*, 49, 59-74.

15. Monteiro Santos, F.A., Soares, A., Trindade L., Nolasco, R. Rodrigues, H. and ISO3D team, 2002. Voltage measurements over the CAM-1 submarine cable between Madeira island and Portugal mainland. *Earth, Planets and Space*, 54, 393-398.

16. Monteiro Santos, F.A., Almeida, E.P., Castro, R.P., Nolasco, R. and Mendes-Victor, L.A., 2002. A Hydrogeological investigation using SP and EM34 surveys. *Earth Planets and Space*, v. 54, 5, 655-662.

17. Pek, J. and Monteiro Santos, F.A., 2002. Magnetotelluric impedances and parametric sensitivities for 1-D generally anisotropic layer media. *Computer and Geosciences*, 28, 939-950.

18. Monteiro Santos, F.A., Mateus, A., Almeida, E.P., Pous, J. and Mendes-Victor, L.A., 2002. Are some of the deep crustal conductive features found in SW Iberia caused by graphite? *Earth and Planetary Science Letters*, 201, 353-367.

19. Monteiro Santos, F.A., Soares, A., Nolasco, M. Rodrigues, H. Luzio, R. and ISO3D team, 2003. Studies of the lithosphere conductivity structure using the CAM-1 (Lisbon-Madeira) submarine cable. *Geophysical Journal International*, 155, 591-600.

20. Monteiro Santos, F.A., 2004. 1-D laterally constrained inversion of EM34 profiling data. *Journal of Applied Geophysics*, 56, 123-134.

21. Mota, R., Monteiro Santos, F. A., A. Mateus, F. O. Marques, M. A. Gonçalves, J. Figueiras, H. Amaral, 2004. Granite fracturing and incipient pollution beneath a recent landfill facility as detected by several geoelectrical surveys. *Journal of Applied Geophysics*, 57, 11-22.

22. Represas, P., Monteiro Santos, F.A., Mateus, A., Figueiras, J., Barroso, M., Martins, R., Oliveira, V., Nolasco, M., Matos, J., 2005. Two and three-dimensional inversion of dipole-dipole data. A case study: the Enfermarias Zn-Pb(-Ag-Sb-Au) Prospect (Moura, Portugal). *Near Surface Geophysics*, 3, 21-31.

23. Eugénio Almeida, F. Monteiro Santos, António Mateus, Wiebke Heis and Jaume Pous, 2005. Magnetotelluric measurements in SW Iberia: new data for the Variscan crustal structures. *G.R.L.*, VOL. 32, L08312, doi:10.1029/2005GL022596, 2005.
24. J. M. Miranda, J. F. Luis, N. Lourenço and F.A. Monteiro Santos, 2005. Identification of the Magnetization Low of the Lucky Strike Hydrothermal Vent Using Surface Magnetic Data, accepted by *Journal of Geophysical Research* 2004JB003085R.
25. Marques, F.O., Marques, F.M.S.F., Mateus, A., Figueiras, J., Santos, F.M., Mota, R., Amaral, H., 2005. The effectiveness of "clay" liners as basal isolation of landfills: A case study. *Environmental Geology*, 10.1007/s00254-005-1247-9.
26. Monteiro Santos, F.A. and Andrade Afonso, A.R., 2005. Detection and 2D modelling of cavities using pole-dipole array *Environmental Geology*, 10.1007/s00254-005-1272-8.
27. G.M. El-Quady, F.A. Monteiro Santos, A. Gh. Hassaneen and L. Trindade, 2005. Title 3D inversion of VES data from Saqqara archaeological area, Egypt. *Near Surface Geophysics*, 227-233.
28. Matias, H. C., Monteiro Santos, F. A., Rodrigues Ferreira, F. E., Machado, C., Luzio, R., 2006. Detection of graves using the micro-resistivity method. *Annals of Geophysics* (accepted).
29. Nolasco, R., Soares, A., Dias, J.M., Monteiro Santos, F.A., Palshin, N.A., Represas, P., and Vaz, N., 2006. Motional Induction Voltage Measurements in estuarine environments: the Ria de Aveiro Lagoon (Portugal). *Geophysical Journal International*, 166(1), 126-134.
30. Monteiro Santos, F.A., A. Mateus, J. Figueiras and M.A. Gonçalves, 2006. Mapping groundwater contamination around a landfill facility using the VLF-EM method – a case study. *Journal of Applied Geophysics* (accepted).
31. Monteiro Santos, F.A., S.A. Sultan, Patrícia Represas and A.L. El Sorady, 2006. Joint inversion of gravity and geoelectric data for groundwater and structural investigation: application to the northwestern part of Sinai, Egypt. *Geophysical Journal International* (accepted).
32. Monteiro Santos, F.A., Trota, A., Soares, A., Luzio, R., Lourenço, N., Matos, L., Almeida, E., Gaspar, J.L., Miranda, J.M., 2006. An audio-magnetotelluric investigation in Terceira Island (Azores). *Journal of Applied Geophysics*, 59,314-323.
33. Monteiro Santos, F.A., Almeida, E.P., Mota Gomes, A., and Pina, A., 2006. Hydrological investigation in Santiago Island (Cabo Verde) using magnetotellurics and VLF methods. *Journal of African Earth Sciences*, 45, 421-430.
34. Sultan, S.A., Monteiro Santos, F.A., and Helal, A., 2006. A study of the groundwater seepage on Hibis temple using geoelectrical data, Kharga Oasis, Egypt. *Near Surface Geophysics* (accepted).

35. Pek, J., and Monteiro Santos, F.A., 2006. Magnetotelluric inversion for anisotropic conductivities in layered media. PEPI (aceite).
36. Mota, R. and Monteiro Santos, F.A., 2006. 2D sections of porosity and water saturation percent from combined resistivity and seismic surveys for hydrogeologic studies. *Leading Edge*, June 2006, 735-737.
37. N. Vieira da Silva, A. Mateus, F. A. Monteiro Santos, E. P. Almeida, J. Pous, 2006. 3-D electromagnetic imaging of a Palaeozoic plate-tectonic boundary segment in SW Iberian Variscides (S Alentejo, Portugal). *Tectonophysics*, doi:10.1016/j.tecto.2007.06.006.
38. Yague P, Dantas P, Ortega F, Cachao M, Santos FAM, Goncalves R, Lopes S. New sauropod material from the Upper Jurassic of Areia Branca (Lourinha, Portugal) *NEUES JAHRBUCH FUR GEOLOGIE UND PALAONTOLOGIE- ABHANDLUNGEN* 240 (3): 313-342 JUL 2006.
39. Monteiro Santos, F.A., Nolasco, R., Soares, A., Dias, J.M. and Bernardo, I., 2007. Estimation of water transport from oscillations of the on-shore telluric field generated by tides. *Earth and Planetary Science Letters*, 263, 420-428. doi:10.1016/j.epsl.2007.09.020
40. Sultan, A.S., Mansour, S.A. and Monteiro Santos, F.A., 2007. Hydrogeological investigation of the Ain Mousa area, near Cairo, Egypt, *Bull Eng Geol Environ*, doi:10.1007/s10064-007-0107-0
41. Sultan, A.S. and Monteiro Santos, F.A., 2007. Evaluating subsurface structures and stratigraphic units using 2-D electrical and magnetic data at the area north Greater Cairo, Egypt. *International Journal of Applied Earth Observations and Geoinformation*, doi:10.1016/j.jag.2007.05.001
42. A. Jardani, A. Revil, F.A.M. Santos, C. Fauchard and J.P. Dupont, 2007. Detection of preferential infiltration pathways in sinkholes using joint inversion of self-potential and EM-34 conductivity data. *Geophysical Prospecting*, 55 (5), 749-760.
43. J. Figueiras, M.A. Gonçalves, A. Mateus, F. O. Marques, F. Monteiro Santos, R. Mota, 2007. Initial stages of pollutants dispersion around municipal waste disposal facilities; a case study in northern Portugal. Revised manuscript accepted for publication in Special issue on Landfill leachate Management and Control: *International Journal of Environment and Waste and Management (IJEWM)* (aceite).
44. Monteiro Santos, F.A., Andrade Afonso, A.R. and Dupis, A., 2007. 2-D joint inversion of dc and scalar audio-magnetotelluric data in the evaluation of low enthalpy geothermal fields. *Journal of Geophysics and Engineering*, 4, 53-62, doi:10.1088/1742-2132/4/1/007. <http://www.iop.org/EJ/abstract/1742-2140/4/1/007>
45. Gerard Muñoz, Antonio Mateus, Jaime Pous, Wiebke Heise, Fernando Monteiro Santos, Eugenio Almeida, 2008. Unraveling middle-crust conductive layers in Palaeozoic Orogens through 3D modeling of magnetotelluric data; the Ossa-Morena Zone case study (SW Iberian Variscides). *JGR*, doi:10.1029/2007JB004987..

46. Sultan, A.S. and Monteiro Santos, F.A., 2008. 1-D and 3-D resistivity inversions for geotechnical investigation, *Journal of Geophys and Engineering*, 5, 1-11, doi:10.1088/1742-2132/5/1/001.

47. Abbas,A.M., Sultan, A.S., Monteiro Santos, F.A., 2008. 2-D and 3-D resistivity in the area of the Menkaure Pyramid Giza, Egypt. *Bull. Eng. Geol. Environ.*, DOI:10.1007/s10064-008-0142-5

48. Sultan, A.S., Mekhemer, H.M. and Monteiro Santos, F.A., 2008. Groundwater exploration and evaluation by using geophysical interpretation (case study: Al Qantara East, North Western Sinai, Egypt). *Arab. J. Geosci*, DOI: 10.1007/s12517-008-0028-7.

49. Ramalho, E., Carvalho, J., Barbosa, S. and Monteiro Santos, F.A., 2008. Using geophysical methods to characterize and abandoned uranium mining site, Portugal. *Journal of Applied Geophysics*, doi: 10.1016/j.jappgeo.2008.08.010

50. Sultan, A.S. and Monteiro Santos, F.A., 2008. Combining TEM/resistivity joint inversion and magnetic data for groundwater exploration: application to the northeastern part of Greater Cairo, Egypt. *Environmental Geology*, DOI: 10.1007/s00254-008-1527-2.

51. Rabeh, K.O. El Faragawy, J.M. Miranda, F.A. Monteiro Santos and M. Ahmed, 2008. The Role Of Geomagnetic Method in Detection Of Mineral Deposits at El-Hody Area, Southeastern Aswan, Egypt. *Near Surface Geophysics*. Issue: Vol 6, 3 June 2008, pp. 195-202.

52. Santos FA, Sultan AS, 2008. On the 3-D inversion of vertical electrical soundings: Applications to the South Ismailia area – Cairo desert road, Cairo, Egypt. *Journal of Applied Geophysics* 65: 97-110.

53. Sultan, A.S., Mohameden, M.I. and Monteiro Santos, FA, 2009. Hydrogeophysical study of the El Qaa Plain, Sinai, Egypt. *Bull Eng Geol Environ*, 68, 525-537. doi: 10.107/s10064-009-0216-z

54. Massoud, Usama, Monteiro Santos, FA; Khalil, Mohamed; Taha, Ayman; Abbas, Abbas, 2009. ESTIMATION OF AQUIFER HYDRAULIC PARAMETERS FROM SURFACE GEOPHYSICAL MEASUREMENTS: A CASE STUDY OF THE UPPER CRETACEOUS AQUIFER, CENTRAL SINAI, EGYPT, *Hydrogeology Journal* (accepted)

55. Monteiro Santos FA, Hector Perea, Usama A. Massoud, João P. Plancha, Jorge Marques, and João Cabral, 2009. Using tensorial electrical resistivity survey to locate fault systems. *J. Geophys. Eng.*, (accepted).

56. Monteiro Santos FA, El-Kliouby, H. 2009. Comparative study of local versus global methods for 1-D joint inversion of DC and TDEM data, *Near Surface Geophysics*, 6, 390-400.

57. Triantafilis J, Monteiro Santos FA 2009. 2-dimensional soil and vadose zone representation using an EM38 and EM34 and a laterally constrained inversion model. *Australian Journal of Soil Research*, 47, in press.
58. Sultan, A.S., Monterio Santos, F.A., Helaly, A.S., 2009. Integrated geophysical interpretation for the area located at the eastern part of Ismailia Canal, Great Cairo, Egypt, *Arab J. Geosci.* DOI 10.1007/s1217-009-0085-6.
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60. Carreira, P.M., Marques, J.M., Pina, A., Mota Gomes, A., Fernandes, P.A.G. and Monteiro Santos, FA, 2009. Groundwater assessment at Santiago Island (Cabo Verde): a multidisciplinary approach to a recurring source of water supply. *Water Resour Manage*, DOI 10.1007/s11269-009-9489-z.
61. Sultan, A.S., Mohameden, M.I. and Monteiro Santos, F.A., 2009. Hydrogeophysical study of the El Qaa Plain, Sinai, Egypt. *Bull. Eng. Geol. Environ.* DOI 10.1007/s10064-009-0216-z.
62. Khalil, M.A., Monterio Santos, F.A., 2009. Influence of degree of saturation in the electric resistivity-hydraulic conductivity relationship. *Surveys in Geophysics*, DOI 10.1007/s10712-009-9072-4.
63. Sultan, A.S., Mekhemer, H.M. and Monteiro Santos, F.A., 2009. Groundwater exploration and evaluation by using geophysical interpretation (case study: Al Qantara East, North Western Sinai, Egypt). *Arab. J. Geosci.*, DOI 10.1007/s12517-008-0028-7.
64. Ramalho, E., Carvalho, J., Barbosa, S. and Monteiro Santos, F.A., 2009. Using geophysical methods to characterize an abandoned uranium mining site, Portugal. *Journal of Applied Geophysics*, 67, 14-33.
65. Massoud, U., Monteiro Santos, F.A., El Qady, G., Atya, M. and Soliman, M., 2009. Identification of the shallow subsurface succession and investigation of the sewer invasion to the Quaternary aquifer at the northern part of El Qaa plain, Southern Sinai, Egypt by transient electromagnetic data. *Geophysical Prospecting*, doi:10.1111/j.1365-2478.2009.00804
66. Massoud, U., El Qady, G., Metwaly, M., Monteiro Santos, F.A., 2009. Delineation of shallow subsurface structure by azimuthal sounding and joint inversion of VES-TEM data: case study near Lake Qaroun, El Fayoum, Egypt. *Pure appl. geophys.*, 166, 701-719, doi: 10.1007/s00024-009-0463-8
67. Khalil, M.A., Monteiro Santos, F.A., Moustafa, S.M. and Saad, U.M. 2009. Mapping water seepage from Lake Nasser, Egypt, using the VLF-EM method: a case study. *J. Geophys. Eng.*, 6 101-110, doi: 10.1088/1742-2132/6/2/001
68. Figueiras, J. Gonçalves, M.A., Mateus, A., Marques, F.O., Monteiro Santos, F.A.

and Mota, R. 2009. Initial stages of pollutants dispersion around municipal waste disposal facilities: a case study in Northern Portugal. *Int. J. Environment and Waste Management*,(in press)

69. Sultan, A.S., Mekhemer, H.M., Monteiro Santos, F.A., Abd Alla, M. 2009. Geophysical measurements for subsurface mapping and groundwater exploration at the central part of the Sinai Peninsula, Egypt. *The Arabian Journal for Science and Engimneering*, 34, 1A, 103-108.

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10. Communications in scientific meetings

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11. Languages

Language

Reading

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