

List of Publications

Papers in Journals

- Mohanty, P. R., and Siddique, F., 2002, Application of tomography reconstruction technique to synthetic cross hole seismic data : Acta Geophysical Polonica, **50**, 3, 381-393.
- Mohanty, P. R., Phadke, S. and Bhattacharya, B. B., 2000, Seismic resolution over coal seams: A numerical study: Acta Geophysica Polonica, **XLVIII**, 2, 215-222.
- Bhattacharya, Bimalendu B., Shalivahan, Pathak, Sobhan, Shaw, Ranjit, K., Mohanty, Priya, R., Sinharay, Rajib, K., and Acharya, Samir, K., 2000, Remote reference (RR) magnetotelluric (MT) studies over Singhbhum granite: Research Highlights in Earth Sciences: Paper no.13, DST, New Delhi, 151-162.
- Mohanty, P. R., Phadke, S., Bhattacharya, Bimalendu, B., 2000, Detection of some typical structural and stratigraphic features in coal seams using seismic modelling and migration, Indian Minerals, **54**, 85-98.
- Mohanty, P. R., Bhattacharya, B. B. and Phadke, S., 1997, High resolution synthetic seismograms over horizontally layered coal seams for Jitpur colliery of the Jharia coal field: Indian Mining Engineering Journal, **36**, 26-29.
- Mohanty, P. R., and Siddique, F., 1994, Delineation of shallow water table in hard rock terrain using seismic refraction method- A case study: Indian Mining Engineering Journal, **33**, 31-34.

Papers in Seminar/Symposium/Workshop

- Migration of synthetic data in transverse isotropic media, Mohanty,P.R.and Gupta,U,2008,Expanded abstract published in 7th.International Conference &Exposition on petroleum Geophysics,Hyderabad, January 12-14,2008,paper no.223,pp1-6.
- Ripping-An excavation technique of future promise,Samal,S,Dash,a,Murthy,V.M.S.R. and Mohanty,P.R.,2007,Published in the Expanded abstract of the national seminar on Modern trends in geophysical Sciences and Techniques,Dhanbad,Nov.12-14,2007,pp232-236.
- Mohanty,P.R.,Phadke,S.and Bhattacharya,B.B.,2006,Application of absorbing boundary conditions in acoustic modeling for high resolution seismics associated with coal measures,Expanded abstract published in seminar on Computational Geophysics ,Feb.26-March1,2006,pp5-11,Organised by CEG, Osmania University,Hyderabad.
- Mohanty,P.R.,Shalivahanand Praharaj,R.N.,2006,gravity exploration for delineation of concealed chrome ore in Nausahi chromite deposit ,Keonjhar, Orissa,Paper published in the proceedings of the national conference on frontier areas in geological and technological aspects of fossil fuel and mineral resources(GTFM-2006),Nov.2-4,2006,pp181-185.
- Mohanty,P.R.,Shaw,R.K.,and Shalivahan,2006,Determination of depth to the bed rock and thickness of geologic strata using sledgehammer and accelerated weight drop seismic energy sources,Abstract published in 43rd.Indian Geophysical Union convention,Nov,23-25,pp49.
- Ganguly,Nand Mohanty,P.R,2005,Seismic wavefield modeling using finite difference techniques,Abstract published in SAP(UGC)seminar on Recent advances in theoretical and applied seismology,Dhanbad,March3-4,2005.
- Murthy, V.M.S.R., Dey, Kaushik and Mohanty, P. R., 2004, Redicting Tunnel Overbreak threshold from acceleration measurements – An Indian Case Studies. Proceeding of 30th Annual Conference on Explosives & Blasting technique, New Orleans, Lousiana, U.S.A. p.389-399, Vol. II, Organised by ISEE. 1-4 Feb, 2004.
- Mohanty, P. R., and Padhy S., 2003, Seismic tomography for synthetic crosshole and vertical seismic profiling (VSP) data using straight and curve ray scheme: National Seminar and Exhibition on Role of IT in the present scenario of globalisation, 331-339.
- Mohanty, P. R., and Bhattacharya, B. B., 2000, Detection of shallow subsurface cavities associated with old

abandoned coal mines of Raniganj coalfield to avoid possible inundation in mine: Published in Proceeding Volume of Mine Environment and Ventilation Symposium, 323-327.

Bhattacharya, B. B., Jha, Sanjay. K., Shaw, R. K., Roy, I. G., Mohanty, P., R., and Acharya, S. K., 1994, Application of geophysical methods in environmental problems: A review: Proc. of Second National Seminar on Minerals and Ecology (ed. S. P. Banerjee), 29-38.

Mohanty, P. R., and Bhattacharya, B. B., 1991, Development of synthetic seismogram for coal seam: Proceedings of International Seminar on Exploration Geophysics in Nineteen Nineties, held in Hyderabad, India on 25-30 Nov., 782-787.

Papers Accepted

Bhattacharya, B. B., Sen, M. K., Stoffa, P. L., Ghosh Roy, I., and Mohanty, P. R., 1992, Global optimization in direct interpretation of VES and MT Data: Accepted for Publication in Proceedings of IMACS International Symposium on Mathematical Modeling and Computer Simulation, Bangalore, India.

Gohra, M., and Mohanty, P. R., 1992, Development of digital velocity analysis programme on synthetic reflection data: Proceedings of Platinum Jubilee Year Symposium on Signal Processing and Modelling of Geosignatures for Exploration of Oil and Natural Gas, 27-29 Feb., BHU Varanasi (in press).

Mohanty, P. R., Bhattacharya, B. B., and Phadke, S., 1997, Improvement of resolution for shallow seismic reflection over coal seam using finite difference depth migration - A numerical study: Accepted for Publication in the Abstract Volume of International Workshop on High Resolution Geophysics organised by Laboratory of Advance Subsurface Imaging, Dept. of Mining and Geological Engineering, The Univ. of Arizona, Tucson, USA.