

Geophysics References (Seismic and GPR)

updated November 21, 1998

Benson, R., Glaccum, R.A., and Noel, M.R., 1988, Geophysical techniques for sensing buried wastes and waste migration: Dublin, OH, National Water Well Association, 236 p.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Bison Instruments, 1987, Instruction manual: Bison Instruments Geopro Model 8012A: Minneapolis, MN, 95 p.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Bushnell, K.A., 1982, Short course notes on shallow geophysical surveying: Unpublished Course Notes, Slippery Rock University.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):l

Collins, M.E., Doolittle, J.A., and Rourke, R.V., 1989, Mapping depth to bedrock on a glaciated landscape with ground-penetrating radar: Soils Science Society of America Journal, v. 53, p. 1806-1812.

Environmental Protection Agency, 1989, Seismic Refraction and Ground Penetrating Radar, in EPA, FIT Geophysical Training Manual: Washington, D.C., p. 18-140.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Green, E.A., 1993, Seismic refraction survey of an alluvial aquifer within Rapid City, South Dakota, using a shotgun as an energy source: Proceedings of the 7th Annual National Outdoor Action Conference and Exposition, p. 339-348.

from T. Wilson

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Harris, J.B., and Street, R.L., 19??, Integrated seismic site characterization of the Paducah, Kentucky, Area: Preliminary results: Unpublished Manuscript?

from T. Wilson

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Heimmer, D.H., 1992, Near-surface, high resolution geophysical methods for cultural resource management and archeological investigations: Geo-Recovery Systems, Inc., 143 p.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Hunter, J.A., Pullan, S.E., Burns, R.A., Gagne, R.M., and Good, R.L., 1984, Shallow seismic reflection mapping of the overburden-bedrock interface with the engineering seismography - some simple techniques: Geophysics, v. 49, p. 1381-1385.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Jol, H.M., 1995, Ground penetrating radar antennae frequencies and transmitter powers compared for penetration depth, resolution and reflection continuity: Geophysical Prospecting, v. 43, p. 693-709.

Jol, H.M., and Smith, D.G., 1995, Ground penetrating radar of peatlands for oil field pipelines in Canada: Journal of Applied Geophysics, v. 34, p. 109-123.

Kesel, R.H., 1976, The use of the refraction-seismic techniques in geomorphology: Catena, v. 3, p. 91-98.

Lankston, R.W., 1989, The seismic refraction method: A viable tool for mapping shallow targets into the 1990s: Geophysics, V. 54, p. 1535-1542.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Lankston, R.W., 1990, High-resolution refraction seismic data acquisition and interpretation, in Society of Exploration Geophysics Investigations in Geophysics No. 5 Geotechnical and Environmental Geophysics: Volume 3, Geotechnical, p. 45-73.

**On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h
from T. Wilson, WVU**

Mellet, J.S., 1990, Ground-penetrating radar enhances knowledge of Earth's surface layer: Geotimes, v 35, no. 9, p. 12-14.

Meyers, R., Smith, D.G., Jol, H.M., and Peters, C.R., 1996, Evidence for eight great earthquake-subsidence events detected with ground-penetrating radar, Willapa barrier, Washington: Geology, v. 24, p. 99-102.

Miller, R.D., Pullan, S.E., Waldner, J.S., and Haeni, F.P., 1986, Field comparison of shallow seismic sources: Geophysics, v. 51, p. 2067-2092.

Miller, R.D., Steeples, D.W., and Brannan, M., 1989, Mapping a bedrock surface under dry alluvium with shallow seismic reflections: Geophysics, v. 54, p. 1528-1534.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Miller, R., Steeples, D., Hill, R., and Gaddis, B., 1990, Identifying intra-alluvial and bedrock structures shallower than 30 meters using seismic reflection techniques, in Society of Exploration Geophysics Investigations in Geophysics No. 5 Geotechnical and Environmental Geophysics: Volume 3, Geotechnical, p. 89-97.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Mills, H.H., 1990, Thickness and character of regolith on mountain slopes in the vicinity of Mountain Lake, Virginia, as indicated by seismic refraction, and implications for hillslope evolution: Geomorphology, v. 3, p. 143-157 (Elsevier Science Publishers).

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Mooney, H.M., 1977, Handbook of engineering geophysics: Minneapolis, MN, Bison Instruments, 120 p.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Olson, C.G., and Doolittle, J.A., 1985, Geophysical techniques for reconnaissance investigations of soils and surficial deposits in mountainous terrain: Soil Science Society of America Journal, v. 49, p. 1490-1498.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Oyo Corporation, 1987, Operation manual for georadar-I: Japan, Oyo Corp., 50 p.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):l

Palmer, D., 1981, An introduction to the generalized reciprocal method of seismic refraction

interpretation: Geophysics, v. 46, no. 11, p. 1508-1518.

Pullan, S.E., and Hunter, J.A., 1985, Seismic model studies of the overburden-bedrock reflections: Geophysics, v. 50, p. 1684-1688.

Pullan, S.E., and Hunter, J., 1990, Delineation of buried bedrock valleys using the optimum offset shallow seismic reflection technique, in Society of Exploration Geophysics Investigations in Geophysics No. 5 Geotechnical and Environmental Geophysics: Volume 3, Geotechnical, p. 75-87.

Sendlein, L.V.A., and Yazicigil, H., 1981, Surface geophysical methods for ground water monitoring, Parts I and II: Ground Water Monitoring Review, Fall Issue, p. ?-?

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):l

Slaine, D., Pehme, P., Hunter, J., Pullan, S., and Greenhouse, J., 1990, Mapping overburden stratigraphy at a proposed hazardous waste facility using shallow seismic reflection methods, in Society of Exploration Geophysics Investigations in Geophysics No. 5 Geotechnical and Environmental Geophysics: Volume 2, Environmental and Groundwater, p. 273-280.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Smith, D.G., and Jol, H.M., 1995, Wasatch Fault (Utah), detected and displacement characterized by ground penetrating radar: Bulletin of the Association of Engineering Geologists, v. 1, p. 489-496.

Smith, D.G., and Jol, H.M., 1995, Ground penetrating radar: attenuated frequencies and maximum probable depths of penetration in Quaternary sediments: Journal of Applied Geophysics, v. 33, p. 93-100.

Steeple, D., and Miller, R., 1990, Seismic reflection methods applied to engineering, environmental, and groundwater problems: in Society of Exploration Geophysics Investigations in Geophysics No. 5 Geotechnical and Environmental Geophysics: volume 1: Review and Tutorial, p. 1-30.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Ware, C., Andrienas, J., Hooton, S., and Feves, M., 1993, Structurally controlled plume migration determination utilizing seismic refraction: Proceedings of the 7th National Outdoor Action Conference and Exposition, p. 325-338.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h

Wilson, T.W., 1997, Unpublished class notes in exploration geophysics: Dept. of Geology and Geography, West Virginia University, Morgantown, WV.

On file(Y/N):y Read?(Y/N):n X-ref(Y/N):n Applicability(0,low,m,high):m-h