

Case Study: Maximizing Seismic Input in Geomodelling by Using PP-PS Pre-Stack Joint Inversion, Birch, N.E. Alberta

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Abstract

Evaluating the prospectivity of oil sands projects involves collaboration between geology, petrophysics, engineering and geophysics in order to create the most realistic geomodel for reservoir simulation. Typical seismic inputs for geomodels include: depth converted surfaces, inversion volumes and neural network volumes. In this case study we show that by incorporating PS data in the inversion, the density volume product is improved as are subsequent derivative products incorporated into the geomodel.