Borehole Seismic Services

ENERGY SOURCES

Halliburton Borehole Seismic Services (BHS) provides customized, reliable, high-resolution solutions that bridge the gap between surface seismic and the wellbore to improve reservoir analysis.

THE COMPLETE PACKAGE

Halliburton uses the latest technology in data acquisition coupled with advanced VSP software to provide quality images of the borehole and its vicinity. From presurvey plan design to data acquisition, processing and interpretation, our fully trained professionals work with you from start to finish to optimize the value on every project.

Using industry-leading borehole seismic downhole array and our dedicated experts, we provide operators with improved data quality while minimizing rig time. Advanced receiver technology is crucial toward obtaining a more accurate and comprehensive geological picture of the well, field or reservoir. For both normal and high-pressure/high-temperature environments, we deliver reliable, high-resolution borehole seismic solutions.

BHS ENERGY SOURCES

Halliburton BHS provides a full range of source equipment for both land and offshore operations. All sources are supported by digital source controllers.

Vibroseis

Our land vibroseis units use advanced vibrator electronics to deliver repeatable and reliable broadband results to match surface-seismic acquisition parameters. Halliburton BHS has invested in a modern fleet of vibrator trucks. In addition to the truck-mounted 45,000-lb vibrator, BHS has Sercel NOMAD 65 buggy vibrators at 62,000 lb.

Airgun Arrays

We offer a range of tuned gun arrays designed to optimize peak/peak-to-peak barn output, peak-to-bubble ratio, with broad, flat frequency spectrum and source directionality. Our airgun array source controllers provide constant real-time tuning to within 1 ms, near- and far-field signatures, gun pressure and depth monitoring.

These technologies help ensure the sources are consistent and repeatable with the maximum frequency bandwidth. We are able to model a wide combination of source configurations to optimize the output depending on the survey requirements.

BHS Truck- and Buggy-Mounted Vibrator Units

BHS DC 1000 Tuned Airgun Array
**Auxiliary Equipment**

Halliburton has developed a unique source deployment system that does not require a crane on the back deck of a vessel. The guns can be safely deployed and retrieved quickly using the Moby system.

Halliburton has the latest in containerized compressor units. These specially designed compressor units include on-board high-pressure storage, 24-hour fuel reservoirs, pressure regulation and a fully automatic engine-management and compressor-control system. These units range in size from dual 25 and 52 ft³/min (0.7 and 1.5 m³/s) to large single 125 and 650 ft³/min (3.5 and 18.4 m³/s).

Our auxiliary source equipment is certified by Det Norske Veritas (DNV), and constructed to the highest standards.

---

For more information, contact your local Halliburton representative or visit us on the web at www.halliburton.com/bhs

Sales of Halliburton products and services will be in accord solely with the terms and conditions contained in the contract between Halliburton and the customer that is applicable to the sale.

H010049 7/17 © 2017 Halliburton. All Rights Reserved.