



# RADIAL BOND TOOL (RBL)

The **Radial Bond Log** tool provides proven superior reliability and responsiveness even in thin cement sheath conditions. With circumferential cement bond evaluation, the **RBL** identifies channels, in addition to standard cement bond logging. The main application of the **Radial Bond Log** tool is to evaluate hydraulic isolation between producing and non-producing zones—a key factor needed to assess the integrity of the well.

In addition to standard cement bond amplitude (CBL) through near receiver (3-ft), and variable density log (VDL) through far receiver (5-ft), the **RBL** tool provides a cement map through eight receivers (Radial @2Ft ), each segment covering 45° section of the pipe which gives a complete 360° evaluation of bond integrity.



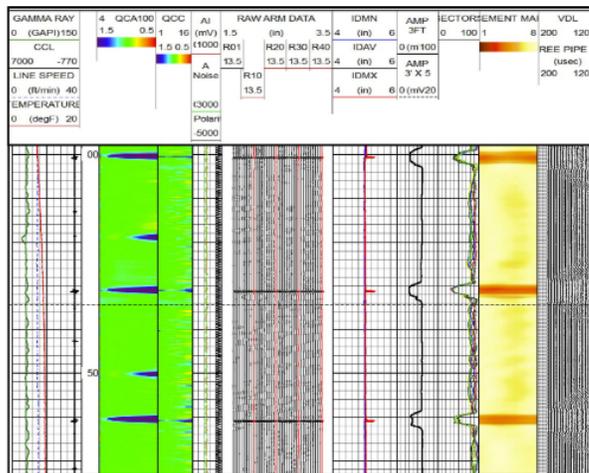
## FEATURES

- Combinable with GOWell’s Pegasus Series Tools for flexible acquisition and rig time saving
- All receivers are built in a slotted housing to provide rigidity, strength, and noise isolation
- Robust design suitable for horizontal logging
- User friendly acquisition software
- Easily run on all standard wirelines
- Warrior compatible

## APPLICATIONS

- Full circumferential resolution for better channel identification
- Provides a 360 degree cement map
- Cement bond quality measurement in slim and conventional wells
- Operates in casing from 3 1/2 in. (89 mm) to 10 3/4 in. (244 mm)
- Indicates channels and intervals using radial receivers
- Measures the attenuation of the acoustic energy in the casing to cement interface

### MULTI-FINGER CALIPER + RADIAL CBL + EM PIPE INSPECTION COMBO LOG EXAMPLE



RBL



# RADIAL BOND TOOL

## SPECIFICATIONS

|                            | RBL43C                                 | RBL70C-A              |
|----------------------------|--|-----------------------|
|                            | P/N 100517188                          | P/N 1.01.06.100519453 |
| <b>GENERAL SPECS</b>       |  |                       |
| Maximum Pressure           | 15,000PSI (103MPa)                     |                       |
| Maximum Temperature        | 350°F (175°C)                          |                       |
| Diameter                   | 1-11/16 in (43 mm)                     | 2-3/4 in (70 mm)      |
| Length                     | 11.8 ft (3.6 m)                        | 100.2 ft (2545 mm)    |
| Weight                     | 55.1lbs ( 25kg)                        | 94.8 lbs (43 kg)      |
| Max. Logging Speed         | 32.8 ft/min (10 m/min)                 |                       |
| Combinability              | Combinable with Pegasus Series Tools   |                       |
| <b>BOREHOLE CONDITIONS</b> |  |                       |
| Borehole Fluids            | Oil, Fresh Water, Brine                |                       |
| Tool Position              | Centralized                            |                       |
| <b>MEASUREMENT</b>         |  |                       |
| Maximum Casing ID          | 7 in. (177.8 mm)                       | 10.75 in. (264 mm)    |
| Minimum Casing ID          | 2 in. (50.8 mm)                        | 3.5 in. (89 mm)       |
| Receivers                  | Radial = 6 Segments                    | Radial = 8 Segments   |
| Measurements               | Near @ 3ft., Far @ 5ft., Radial @ 2ft. |                       |
| Wave Sample Rate           | 2us for All Waves                      |                       |
| <b>HARDWARE FEATURES</b>   |  |                       |
| Voltage                    | 15V to 36V                             | 18V to 36V            |
| Current                    | 100 ~180 mA @ 18v                      | ≤ 430 mA @ 18v        |
| Tool Time Cycle            | 480 ms                                 | 3 x 50ms - 150ms      |
| Transducer Type            | 30±2 KHz Piezoelectric                 | 20 KHz Piezoelectric  |