

Endura® Dual-String Section Mill

Mills adjacent casing strings in plug-and-abandonment operations

Applications

- Plug-and-abandonment (P&A) operations
- Milling 9 5/8- to 13 5/8-in. (244- to 346-mm) casing strings and long casing sections

Features and Benefits

- The Endura dual-string section mill (DSSM) enhances the efficiency of P&A operations by milling both inner and outer casing strings.
- The DSSM has multiple stabilizers for optimal milling performance.
- The milling run efficiently prepares wellbores for cement plugging.
- The DSSM helps to fulfill some of the most stringent regulatory requirements for well abandonment.

Tool Description

The Weatherford Endura DSSM mills inner and outer casing strings with diameters from 9-5/8 to 13-5/8 in. (244 to 346 mm). The DSSM includes multiple points of stabilization for optimal milling performance: a hydraulic, expandable stabilizer and an integral stabilizer.

The DSSM has an 8 1/4-in. (210 mm) outside diameter (OD) to enable passage through casing restrictions. After the section of inner casing is removed with the standard section mill, the slim OD of the DSSM enables the mill to return through this inner casing to the open section. The hydraulic, expandable stabilizer—located on the bottom stage of the DSSM—brings the tool to the center of the outer casing string and prevents lateral movement by expanding to the inside diameter (ID) of the outer casing. The cutting blades then expand with the built-in integral stabilizer to begin the milling process. The 13-in. (330-mm), full-gauge milling blades enable milling long casing sections.

By completely removing casing, the milling run prepares wellbores for permanent rock-to-rock cement plugging. In doing so, the DSSM helps to address common problems associated with section milling in P&A operations and helps to fulfill some of the most stringent regulatory requirements for well abandonment.

Specifications

Connection	4 ½ IF / NC 50
Tool OD	8 1/4 in. (210 mm)
Tool ID	2 1/4 in. (57 mm)
Tool length	20 ft (6.1 m)
Torque rating on body	38,000 ft/lb (51,521 N·m)
Torque rating on blades	15,000 ft/lb (20,337 N·m)
Maximum milling sweep	14 3/4 in. (368 mm)
Casing sizes	9 5/8 to 13 5/8 in. (244 to 346 mm)



The Weatherford Endura DSSM mills inner and outer casing strings to efficiently prepare wellbores for cement plugging.

