



WTSP4 Liner-Top Packer

Weatherford's WTSP4 liner-top packer is run as an integral part of the liner hanger assembly to provide a reliable, high-integrity seal that isolates the gap between the liner OD and the host casing ID. This reliable liner-top packer isolates the cement, preventing gas migration or flow while the cement sets. The WTSP4 also incorporates the profile for the running tool and, when a liner setting sleeve is not run, is the means by which the running tool connects to the liner.

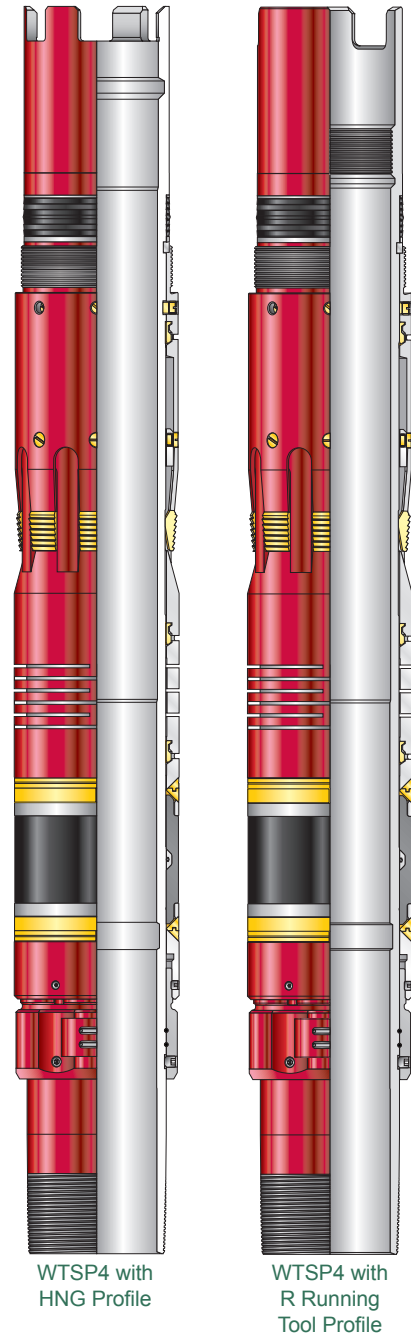
The packer is normally set by setting down weight on the WTSP4 tie-back polished bore receptacle with the packer actuator after the running tool is released. The weight is transferred to the WTSP4 liner-top packer, setting the element and the holddown slips.

Applications

- Any cemented liners
- Uncemented liners for which a seal between the liner OD and the host casing ID is necessary or advantageous
- Tie-back packers

Features, Advantages and Benefits

- Peroxide-cured HNBR packing element creates a reliable seal that prevents gas migration in the cement in most well conditions, saving the cost of a liner-top squeeze.
- One-piece packing element is resistant to swabbing to enable high circulation rates past the liner-top packer assembly, aiding removal of debris during well cleaning and improving the quality of cement displacement.



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Features, Advantages and Benefits (continued)

- Integral beam spring stores an internal force that helps boost the setting load on the element under dynamic loading conditions, such as temperature or pressure changes, maintaining seal integrity.
- High-torque, one-piece mandrel is equipped with premium connections that meet or exceed the torque of the liner connections.
- XYLAN® coated backup rings reduce the setting force required for energizing the packing element. This advantage is particularly useful in applications (such as extended-reach wells) that present a challenge to getting enough weight down to set the liner-top packer.
- Holddown slips and integral body lock-ring ratchet system positively lock in the applied setting forces to ensure that the packer does not become unset.
- The WTSP4 liner-top packer incorporates the profile and seal bore for Weatherford's RSM retrievable cement packoff. This feature eliminates the need for—and cost of—a separate assembly. It also ensures easy retrieval of the packoff because the packoff does not have to be retrieved through a premium connection.
- One WTSP4 can be set inside host casings of the same size but varying weights. This design provides operational flexibility.

Specifications

Contact an authorized Weatherford representative.

Options

- The WTSP4 liner-top packer is available in most sizes with running profile for either the R running tool or the HNG running tool.
- Standard metallurgies in most sizes are L-80 and P-110 (125 KSI); other metallurgies are available on request.
- Standard connection is VAM® TOP® HT in most sizes; other connections are available on request.

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