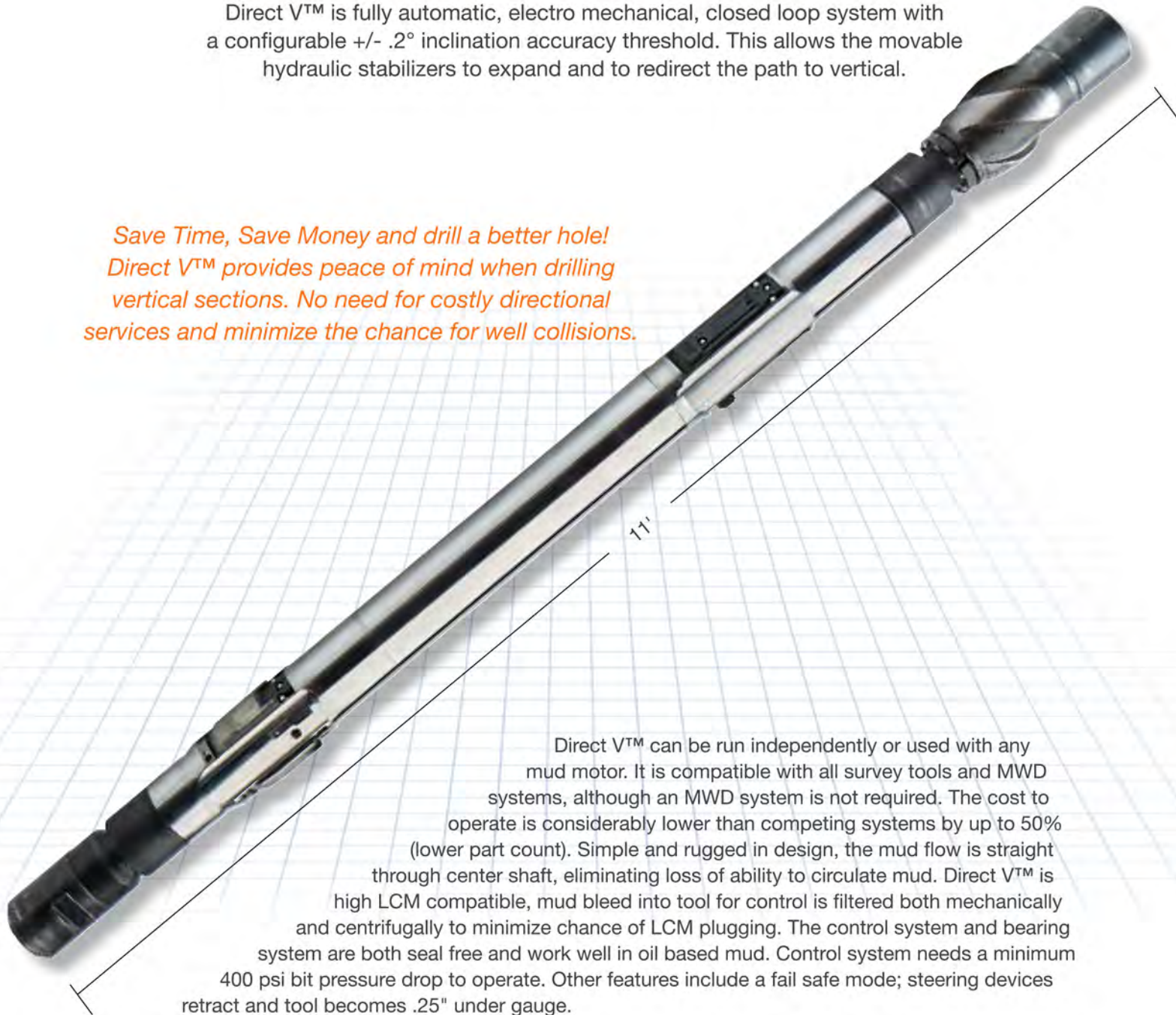


## Direct V™ – The Steerable Tool Revolutionize Straight Hole Drilling

Direct V™ is fully automatic, electro mechanical, closed loop system with a configurable +/- .2° inclination accuracy threshold. This allows the movable hydraulic stabilizers to expand and to redirect the path to vertical.

*Save Time, Save Money and drill a better hole!  
Direct V™ provides peace of mind when drilling  
vertical sections. No need for costly directional  
services and minimize the chance for well collisions.*



Direct V™ can be run independently or used with any mud motor. It is compatible with all survey tools and MWD systems, although an MWD system is not required. The cost to operate is considerably lower than competing systems by up to 50% (lower part count). Simple and rugged in design, the mud flow is straight through center shaft, eliminating loss of ability to circulate mud. Direct V™ is high LCM compatible, mud bleed into tool for control is filtered both mechanically and centrifugally to minimize chance of LCM plugging. The control system and bearing system are both seal free and work well in oil based mud. Control system needs a minimum 400 psi bit pressure drop to operate. Other features include a fail safe mode; steering devices retract and tool becomes .25" under gauge.

For more information about Direct V, or our other Vertex quality downhole products, contact Quentin Paré at 1-587-349-5468 or email [qpare@vertexdownhole.com](mailto:qpare@vertexdownhole.com)

**VERTEX**  
DOWNHOLE

*Run casing in comfort with reduced requirements for wiper and reaming runs. Creating a dogleg free wellbore has never been easier!*



## Direct V™ Advantages

- Save money; more cost effective than a MWD motor configuration
- Automatically corrects drift
- Steerable hole means less hole friction, less stuck drill strings
- Improved hole cleaning
- 4 battery packs equals 300 hours
- Easier casing runs, due to less tortuous holes
- Stays within extremely tight targets
- Higher ROP — continuous rotation increase ROP over sliding with motor
- Unlimited mud capability; where some chemicals and muds attack motor stators
- More accurate directional control, sensors are close to bit, no motor tool face windup, the DCT can make directional corrections in a timelier manner than a person
- Drills wells faster, with more weight on bit, without need for feathering or correction slides
- No need for expensive mud motor

Select the appropriate steering blades and stabilizing inserts for your hole size.

## Sizes & Specifications

6.5" tool, hole sizes are: 7.875", 8.375", 8.5", 8.75"

Pressure rating — 20,000 psi  
Max operating temp — 329° F / 165° C  
Maximum WOB — 58,000 lbs  
Flow rate range — 300-650 gpm  
Max rotary speed — 250 rpm  
Max torque — 16,600 ft-lbs  
Max overpull to failure is 821,000 lbs  
Max overpull to re-run is 625,000 lbs

8.0" tool (available July 2017) hole sizes are: 9.875" - 12.25"

Automated closed loop control — Yes  
Integrated electronics — Yes  
Integrated MWD — No  
Tool length — 11'  
Configurable build range — 0-4°/100 (formation dependent)  
Bit Pressure Drop limits pressure drop across tool, 400 psi minimum/1,200 psi maximum.



Removable spiral blade stabilizers are cost efficient and easy to replace.

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