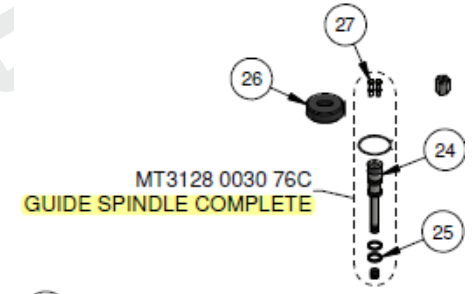


BSH OPEN POSITION-
 Full pump pressure, supplied through Y353A, pushes large external piston backwards to open the BSH. This then presses on the smaller internal guide piston retracting it also. Please Note: Y354B is also actuated in momentarily activated by the RCS software before going to close position to ensure cylinders centralise.

- High pressure
- 30 to 40bar pressure
- Tank pressure

BSH GUIDE POSITION
 Oil passes via Y353B, through the centre of the guide spigot allowing full pump pressure (or 150bar on update system) to push down on the inside of the larger main piston and push up on the internal piston. This design allows the internal hydraulic oil volume to be adjusted, which is then relative to the cylinder stroke length.

30-40 bar resistance pressure from an inline relief valve, helps to assist the larger piston from creeping to close due to high tank pressures.



Testing guide creep - Bypass test

Start pumps and move BSH cylinder position to 'OPEN'. Turn off and isolate machine. Remove both 'B' port hoses and cap off, leaving the cylinder ports open to atmosphere. Remove isolations, re-energise machine and start the pumps. Once positioning pump loaded, engage the guide position (Note: A small amount of oil will be discharged temporarily), monitor cylinder porting for constant flow/leakage, this may take up to 5minutes to occur, dependant on the position of the cylinder porting.

MTspool upgrade can be fitted to prevent spool seal failure

BSH CLOSE POSITION
 Reduced pressure of 80bar (100bar with ST58/ST68 consumables) pushes the back side of the external and internal pistons to keep cylinder fully closed. Please Note: Guide function (Y353B) is momentarily activated by the RCS software before going to close