

RECOMMENDED* TARGET ISO CLEANLINESS CODES

SYSTEMS USING PETROLEUM BASED FLUIDS

PER ISO 4406 FOR PARTICLE SIZES $4\mu_{[C]}$ / $6\mu_{[C]}$ / $14\mu_{[C]}$

PRESSURE	PRESSURE	PRESSURE
<138 bar	138-207 bar	>207 bar
<2000 psi	2000-3000 psi	>3000 psi

Actuators

Cylinders	17/15/12	16/14/11	15/13/10
Vane Motors	20/18/15	19/17/14	18/16/13
Axial Piston Motors	19/17/14	18/16/13	17/15/12
Gear Motors	20/18/14	19/17/13	18/16/13
Radial Piston Motors	20/18/15	19/17/14	18/16/13

Bearings

Ball Bearing	15/13/10	-	-
Gearbox (Industrial)	17/16/13	-	-
Journal Bearing (High Speed)	17/15/12	-	-
Journal Bearing (Low speed)	17/15/12	-	-
Roller Bearing	16/14/11	-	-

Pumps

Fixed Gear	20/18/15	19/17/15	-
Fixed Piston	19/17/14	18/16/13	17/15/12
Fixed Vane	20/18/15	19/17/14	18/16/13
Variable Piston	18/16/13	17/15/13	16/14/12
Variable Vane	18/16/13	17/15/12	-

***NOTE:**

- These are generic guidelines only. Please confirm exact oil cleanliness standards with OEM or filter supplier.
- Oil analysis flagging limits can be adjusted as needed. Please contact Fluid Life Customer Care for assistance at 1-877-962-2400 or customercore@fluidlife.com.

PRESSURE	PRESSURE	PRESSURE
<138 bar	138-207 bar	>207 bar
<2000 psi	2000-3000 psi	>3000 psi

Valves

Cartridge	18/16/13	17/15/12	17/15/12
Check Valve	20/18/15	20/18/15	19/17/14
Directional (Solenoid)	20/18/15	19/17/14	18/16/13
Flow Control	19/17/14	18/16/13	18/16/13
Pressure Control (Modulating)	19/17/14	18/16/13	17/15/12
Proportional Cartridge Valve	17/15/12	17/15/12	16/14/11
Proportional Directional	17/15/12	17/15/12	16/14/11
Proportional Flow Control	17/15/12	17/15/12	16/14/11
Proportional Pressure Control	17/15/12	17/15/12	16/14/11
Servo Valve	16/14/11	16/14/11	15/13/10

Test Stands, Hydrostatic

Test Stands	17/15/12	16/14/11	15/13/10
Hydrostatic Transmissions	20/18/15	19/17/14	18/16/13