

4740-4742 High Pressure Vessels

Maximum Working Pressure & Temperature Ratings

Materials of Construction:	Head & Cylinder: Screw Cap: (A33HD2) Compression Bolt	T316 Stainless Steel SA193 Alloy Steel SA453 Alloy steel
Temperature	Pressure	Limiting Part
350 °C	8500 psi (586 bar)	Cylinder Wall
400 °C	8300 psi (572 bar)	Cylinder Wall
450 °C	7100 psi (489 bar)	Screw Cap Wall
500 °C	4100 psi (282 bar)	Screw Cap Wall
538 °C	1850 psi (127 bar)	Screw Cap Wall
The maximum temperature rating for the SA193 and the SA453 material is 538 °C		

Materials of Construction:	Head & Cylinder: Screw Cap: (A33HD2CH) Compression Bolt	T316 Stainless Steel Alloy C-276 SA453 Alloy steel
Temperature	Pressure	Limiting Part
350 °C	8500 psi (586 bar)	Cylinder Wall
400 °C	8300 psi (572 bar)	Cylinder Wall
450 °C	8100 psi (558 bar)	Cylinder Wall
500 °C	8000 psi (551 bar)	Cylinder Wall
538 °C	7900 psi (544 bar)	Cylinder Wall
The maximum temperature rating for the SA453 material is 538 °C		

Materials of Construction:	Head & Cylinder: Screw Cap: (A33HD2CH) Compression Bolt	Alloy C-276 Alloy C-276 SA453 Alloy steel
Temperature	Pressure	Limiting Part
350 °C	9400 psi (648 bar)	Compression Bolt
400 °C	9400 psi (648 bar)	Compression Bolt
450 °C	9400 psi (648 bar) [614 bar for CE orders]	Comp. Bolt [Screw Cap Wall for CE orders]
500 °C	9400 psi (648 bar) [586 bar for CE orders]	Comp. Bolt / Screw Cap Wall [Screw Cap Wall for CE orders]
538 °C	8900 psi (613 bar) [545 bar for CE orders]	Screw Cap Wall
The maximum temperature rating for the SA453 material is 538 °C		