



ASTM A193 B16

INTERNATIONAL EQUIVALENT CODES

Europe
EN
40CrMoV4-6

Italy
UNI

Germany
DIN
W.n.
40CrMoV4-6
17711

UK
B.S.
670-860

USA
ASTM
UNS
A193 B16

CHEMICAL REQUIREMENTS (Composition , percent)

C	Mn	Max Phosph	Max Sulfur	Si	Cr	Nickel	Mo	Copper	Niobium	Titanium	Vanadium	Max Al	Max Cobalt	Max Iron
0,36-0,47	0,45-0,70	0,035	0,04	0,15-0,35	0,80-1,15		0,50-0,65	--			0,25-0,35	0,015		

MECHANICAL REQUIREMENTS

Diameter,in.	MinTempering Temperature ,°F	Tens.strength, min, ksi	Yield Strength, min, 0,2%offset ksi	Elongation 4D, min	Reduction of Area,min,%	Hardness max
2.1/2" and under	1200	125	105	18	50	321HBW or 35 HRC
over 2.1/2" to 4"	1200	110	95	17	45	321HBW or 35 HRC
over 4" to 8"	1200	100	85	16	45	321HBW or 35 HRC

Diameter,in.	MinTempering Temperature ,°C	Tens.strength, min, Mpa	Yield Strength, min, 0,2%offset Mpa	Elongation 4D, min	Reduction of Area,min,%	Hardness max
M64 and under	650	860	725	18	50	321HBW or 35 HRC
over M64 to M100	650	760	655	17	45	321HBW or 35 HRC
over M100 to M200	650	690	585	16	45	321HBW or 35 HRC