

Quality	100CrMo7					
According to standards	EN ISO 683-17: 2012					
Number	1.3537 B5					
 KRANTI INDUSTRIAL METAL SUPPLIER LLP						
Chemical composition						
C%	Si%	Mn%	P%	S%	Cr%	
max			max	max	max	
0.93-1.05	0.15-0.35	0.25-0.45	0.025	0.015	1.65-1.95	
	Mo%	Al%	Cu%			
	max	max	max			
	0.15-0.30	0.050	0.30			
Temperature °C						
Hot-forming	Quenching	Tempering	Stress-relieving		Soft Annealing	
1100-850	850 oil or polymer, salt bath	150-220	600-650 furnace cooling		730 air	
	500-550	air			(HB max 220)	
Mechanical properties						
Table of tempering values obtained at room temperature after quenching at 850°C in oil						
HB	739	739	722	670	615	595
HRC	65	65	64	61	58	57
R N/mm2			2000	2400	2430	2300
Rp 0.2 N/mm2			1800	2050	2150	2090
A						
Z						
Tempering at °C	50	100	150	200		
Thermal Expansion	10 ⁻⁶ . K ⁻ⁱ				12	
Modulus of elasticity long.	GP a	210				
Modulus of elasticity tang.	GP a	80				
Poisson Number	v	0.3				
Specific heat capacity	J/(kg.K)	480				
Density	kg/dm3	7.8				
Thermal Conductivity	W/(m.K)	45				
Specific electric resistivity	ohm.mm2/m Siemens.m/m	0.22				
Electrical conductivity	m2	4.54				
°C		20	100	200	300	

