

**SPECIFICATION FOR DUCTILE( NODULAR / SPHEROIDAL IRON )**

Country	Specification	Designation	Minimum Tensile Strength / Elongation											
<b>India</b>		SG	800/2	700/2	600/3	500/7			420/12		400/18	350/22		
<b>United Kingdom</b>	BS2789:1985		800/2	700/2	600/3	500/7			420/12		400/18	350/22		
<b>USA</b>	ASTM A536-84:1976		120-90-02	100-70-03	80-60-03	80-55-06			65-45-12		60-42-10	60-40-18		
<b>German</b>	Din 1693-1973	GGG	800/2	700/2	600/3	500/7			400/15		400/18	350/22		
<b>France</b>	NF A 32-201:1976	FGS	800/2	700/2	600/3	500/7			400/12		370/17	--		
<b>Italy</b>	UNI 4544:1979	GS	800/2	700/2	600/3	500/7			400/12		370/17	--		
<b>Japan</b>	JIS G5502:1982	FCD	(80)758/2	(70)686/2	(60)588/3	(50)490/7			(40)392/12		(37)363/17	--		
<b>International</b>	ISO 1083:1976		800/2	700/2	600/3	500/7			400/12		370/17			
			(827/2)	(689/3)	(555/3)	(552/6)			(448/12)		(415/10)	(414/18)		
<b>Hardness BHN</b>			248-352	229-302	192-269	170-241			201 max		179 max	160 max		
<b>Structure</b>			P or T	P	P & F	F & P			F		F	F		
<b>Equivalence kgf/mm2</b>			81.6	71.4	61.2	51			42.8		40.8	35.7		
			TC	Si	Mn (max)	TC	Si	Mn (max)	TC	Si	Mn (max)	Tc	Si	Mn (max)
			3.6-3.8	2.6-2.8	0.5	3.6-3.8	2.6-2.8	0.3	3.6-3.8	2.6-2.8	0.2	3.6-3.8	2.6-2.8	0.1
			3.5-3.6	2.2-2.5	0.6	3.5-3.6	2.2-2.5	0.35	3.5-3.6	2.2-2.4	0.25	3.5-3.6	2.2-2.4	0.15
			3.5-3.6	2.1-2.3	0.7	3.5-3.6	2.1-2.4	0.4	3.5-3.6	2.1-2.4	0.3	3.5-3.6	2.2-2.4	
			3.4-3.5	1.9-2.1	0.8	3.4-3.5	2.0-2.2	0.5	3.4-3.5	2.0-2.2	0.35	3.4-3.5	1.8-2.0	
			3.4-3.5	1.8-2.0	0.8	3.4-3.5	1.8-2.0	0.6	3.4-3.5	1.8-2.0		3.4-3.5	1.8-2.0	0.25

**NOTE:** The above standards for ordering reference only the customer can specify any special requirement. All specifications are subject to change without prior notice.