

**HARDNESS CONVERSION PER ASTM E-140,  
STRENGTH PER ASTM A 370, TABLE 2**

Brinell Hardness HB 10/3000/15		Rockwell Hardness			Superficial Hardness			Approx. Tensile KSI
Dia. (mm)	HB	A 60kg	B 100kg	C 150kg	15N 15kg	30N 30kg	45N 45kg	
---	---	86	---	68	93	84	75	---
---	---	85	---	67	93	84	74	---
---	---	84.5	---	66	92.5	83	73	---
---	---	84	---	65	92	82	72	---
---	---	83.5	---	64	92	81	71	---
---	---	83	---	63	91.5	80	70	---
---	---	82	---	62	91	79.5	69	---
---	---	81	---	60	90	77.5	67	---
---	---	80.5	---	58.5	89.5	76	65	345
2.50	601	80	---	57	89	75	63	325
2.55	578	79	---	56	88	74	62	313
2.60	555	78.5	---	55	88	73	61	301
2.65	534	78	---	53.5	87	71.5	59	287
2.70	514	77	---	52	86.5	70	57.6	273
2.75	495	76	---	51	86	69.5	56	264
2.80	477	75.5	---	49.5	85.5	68	54.5	252
2.85	461	75	---	48.5	85	67	53	241
2.90	444	74	---	47	84	66	51.5	229
2.95	429	73.5	---	45.5	83.5	64.5	50	220
3.00	415	73	---	44.5	83	63.5	48.5	210
3.05	401	72	---	43	82	62	47	201
3.10	388	71.5	---	41.5	81	61	45	193
3.15	375	70.5	---	40.5	80.5	60	44	185
3.20	363	70	---	39	80	59.5	42	177
3.25	352	69	---	38	79.5	58	41	171
3.30	341	68.5	---	36.5	78.5	56.5	39.5	165
3.35	331	68	---	35.5	78	55.5	38	158
3.40	321	67.5	---	34	77	54	36	152
3.45	311	67	---	33	76.5	53	35	149
3.50	302	66.5	---	32	76	52	34	146
3.55	293	66	---	31	75.5	51	32.5	141
3.60	285	65	---	30	75	50.5	31	138
3.65	277	64.5	---	29	74.5	50	30	135
3.70	269	64	---	28	74	48.5	29	131
3.75	262	63.5	---	27	73.5	48	28	128
3.80	255	63	---	25.5	72.5	46.5	26	124
3.85	248	62.5	---	24	71.5	45	24.5	119

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Dia. (mm)	HB	A 60kg	B 100kg	C 150kg	15T 15kg	30T 30kg	45T 45kg	
3.90	241	62	100	23	93	83	73	116
3.95	235	61.5	99	22	93	82.5	72	114
4.00	229	61	98	20.5	92.5	82	71	109
4.05	223	60	97	19.5	92	81	70	104
4.10	217	59	96	---	92	80.5	69	102
4.15	212	58	95	---	91.5	80	68	100
4.20	207	57.5	94	---	91	79	67	98
4.25	201	57	93	---	91	78.5	66	94
4.30	197	56.5	92	---	90.5	78	65	92
4.35	192	56	91	---	90	77	64	90
4.40	187	55	90	---	90	76.5	63	89
4.45	183	55	89.5	---	90	76	62.5	89
4.50	179	54.5	89	---	89.5	76	62	88
4.55	174	53.5	87.5	---	89	75	60	85
4.85	152	50	81	---	87	70.5	54	73
4.90	149	49.5	80	---	86.5	70	53	72
4.95	146	49	79	---	86	69	52	70
5.00	143	48.5	78	---	86	68.5	51	69
5.05	140	47.5	76.5	---	85.5	67.5	49.5	68
5.10	137	47	75	---	85	66.5	48	66
5.15	134	46	74	---	84.5	66	47	65
5.20	131	46	73	---	84	65	46	64
5.25	128	45	71.5	---	84	64	44	63
5.30	126	44.5	70.5	---	83.5	63.5	43.5	61
5.35	123	44	69	---	83	62.5	42	60
5.40	121	43	68	---	83	62	41	59
5.45	118	43	67	---	82.5	61	40	58
5.50	116	42	65	---	82	60	38	56
5.55	114	41.5	64	---	81.5	59	37	---