

Tabela de equivalência de - dureza - ASTM E140 - 05

Tabela 1

Rockwell C Hardness	Vickers Hardness	Rockwell Superficial Hardness Number		
		15-N	30-N	45-N
68	940	93.2	84.4	75.4
67	900	92.9	83.6	74.2
66	865	92.5	82.8	73.3
65	832	92.2	81.9	72.0
64	800	91.8	81.1	71.0
63	772	91.4	80.1	69.9
62	746	91.1	79.3	68.8
61	720	90.7	78.4	67.7
60	697	90.2	77.5	66.6
59	674	89.8	76.6	65.5
58	653	89.3	75.7	64.3
57	633	88.9	74.8	63.2
56	613	88.3	73.9	62.0
55	595	87.9	73.0	60.9
54	577	87.4	72.0	59.8
53	560	86.9	71.2	58.6
52	544	86.4	70.2	57.4
51	528	85.9	69.4	56.1
50	513	85.5	68.5	55.0
49	498	85.0	67.6	53.8
48	484	84.5	66.7	52.5
47	471	83.9	65.8	51.4
46	458	83.5	64.8	50.3
45	446	83.0	64.0	49.0
44	434	82.5	63.1	47.8
43	423	82.0	62.2	46.7
42	412	81.5	61.3	45.5
41	402	80.9	60.4	44.3
40	392	80.4	59.5	43.1
39	382	79.9	58.6	41.9
38	372	79.4	57.7	40.8
37	363	78.8	56.8	39.6
36	354	78.3	55.9	38.4
35	345	77.7	55.0	37.2
34	336	77.2	54.2	36.1
33	327	76.6	53.3	34.9
32	318	76.1	52.1	33.7
31	310	75.6	51.3	32.5
30	302	75.0	50.4	31.3
29	294	74.5	49.5	30.1
28	286	73.9	48.6	28.9
27	279	73.3	47.7	27.8
26	272	72.8	46.8	26.7
25	266	72.2	45.9	25.5
24	260	71.6	45.0	24.3
23	254	71.0	44.0	23.1
22	248	70.5	43.2	22.0
21	243	69.9	42.3	20.7
20	238	69.4	41.5	19.6

Tabela de equivalência de - dureza - ASTM E140 - 05

Tabela 2

Rockwell B Hardness	Rockwell Superficial Hardness Number			Vickers Hardness
	15-T	30-T	45-T	
100	93.1	83.1	72.9	240
99	92.8	82.5	71.9	234
98	92.5	81.8	70.9	228
97	92.1	81.1	69.9	222
96	91.8	80.4	68.9	216
95	91.5	79.8	67.9	210
94	91.2	79.1	66.9	205
93	90.8	78.4	65.9	200
92	90.5	77.8	64.8	195
91	90.2	77.1	63.8	190
90	89.9	76.4	62.8	185
89	89.5	75.8	61.8	180
88	89.2	75.1	60.8	176
87	88.9	74.4	59.8	172
86	88.6	73.8	58.8	169
85	88.2	73.1	57.8	165
84	87.9	72.4	56.8	162
83	87.6	71.8	55.8	159
82	87.3	71.1	54.8	156
81	86.9	70.4	53.8	153
80	86.6	69.7	52.8	150
79	86.3	69.1	51.8	147
78	86.0	68.4	50.8	144
77	85.6	67.7	49.8	141
76	85.3	67.1	48.8	139
75	85.0	66.4	47.8	137
74	84.7	65.7	46.8	135
73	84.3	65.1	45.8	132
72	84.0	64.4	44.8	130
71	83.7	63.7	43.8	127
70	83.4	63.1	42.8	125
69	83.0	62.4	41.8	123
68	82.7	61.7	40.8	121
67	82.4	61.0	39.8	119
66	82.1	60.4	38.7	117
65	81.8	59.7	37.7	116
64	81.4	59.0	36.7	114
63	81.1	58.4	35.7	112
62	80.8	57.7	34.7	110
61	80.5	57.0	33.7	108
60	80.1	56.4	32.7	107

Rockwell B Hardness Number, 100 kgf, 1/16-in.	Rockwell Superficial Hardness Number			Vickers Hardness Number (HV)
	15-T SCALE. 15-kgf, 1/16-in Ball (1.588-mm)	30-T SCALE. 30-kgf, 1/16-in Ball (1.588-mm)	45-T SCALE. 45-kgf, 1/16-in Ball (1.588-mm)	
59	79.8	55.7	31.7	106
58	79.5	55.0	30.7	104
57	79.2	54.4	29.7	103
56	78.8	53.7	28.7	101
55	78.5	53.0	27.7	100
54	78.2	52.4	26.7	-
53	77.9	51.7	25.7	-
52	77.5	51.0	24.7	-
51	77.2	50.3	23.7	-
50	76.9	49.7	22.7	-
49	76.6	49.0	21.7	-
48	76.2	48.3	20.7	-
47	75.9	47.7	19.7	-
46	75.6	47.0	18.7	-
45	75.3	46.3	17.7	-
44	74.9	45.7	16.7	-
43	74.6	45.0	15.7	-
42	74.3	44.3	14.7	-
41	74.0	43.7	13.6	-
40	73.6	43.0	12.6	-
39	73.3	42.3	11.6	-
38	73.0	41.6	10.6	-
37	72.7	41.0	9.6	-
36	72.3	40.3	8.6	-
35	72.0	39.6	7.6	-
34	71.7	39.0	6.6	-
33	71.4	38.3	5.6	-
32	71.0	37.6	4.6	-
31	70.7	37.0	3.6	-
30	70.4	36.3	2.6	-

