WOOD SPECIES DRIVEABILITY CHART

SPOTNAILS®

		JANKA HARDNESS*		DENSITY		18GA BRADS			15GA FINISH NAILS					
WOOD SPECIES	Grouping	pounds-force (lbf)	newtons (N)	(lb/ft3)	(kg/m3)	7/16"	5/8"	3/4"	1/2"	5/8"2	3/4"3	1"	1-1/4"	1-1/2"
Balsa	Group 5	90	390	9	150	•	•	•	•	•	•	•	•	•
Andean Alder	Group 4	430	1913	24	384	•	•	•	•	•	•	•	•	•
Okoume	Group 3	400	1779	27	433	•	•	•	•	•	•	•	•	•
Ponderosa Pine		460	2050	28	450	•	•	•	•	•	•	•	•	•
Black Spruce		520	2320	28	450	•	•	•	•	•	•	•	•	•
Poplar		540	2400	29	455	•	•	•	•	•	•	•	•	•
Horse Chestnut	Group 2	820	3630	31	500	•	•	•	•	•	•	•	•	•
Douglas Fir		620	2760	32	510	•	•	•	•	•	•	•	•	•
Radiata Pine		710	3150	32	515	•	•	•	•	•	•	•	•	•
Eastern Red Cedar		900	4000	33	530	•	•	•	•	•	•	•	•	•
Southern Yellow Pine		730	3250	34	545	•	•	•	•	•	•	•	•	•
Loblolly Pine		690	3070	35	570	•	•	•	•	•	•	•	•	•
Okume Marine Plywood		690	3070	35	570	•	•	•	•	•	•	•	•	•
Black Cherry		950	4230	35	560	•	•	•	•	•	•	•	•	
Rubberwood		960	4270	37	593	•	•	•	•	•	•	•	•	
LDF		VARIES BETWEEN MANUFACTURERS		±37	±590	•	•	•	•	•	•	•	•	
Red Maple		950	4230	38	610	•	•	•	•	•	•	•	•	
Black Walnut		1010	4493	38	610	•	•	•	•	•	•	•	•	
Teak		1070	4740	41	655	•	•		•	•	•	•	•	
Dark Red Meranti (Mahogany)		800	3570	42	675	•			•	•	•	•	•	
Southern Red Oak		1060	4720	42	675	•			•	•	•	•		
Yucatan Rosewood		1210	5400	42	680	•			•	•	•	•		
White Ash		1320	5870	42	675	•			•	•	•	•		
Northern Red Oak	Group 1	1220	5430	44	700	•			•	•	•			
Hard Maple		1450	6450	44	705	•			•	•	•			
American Beech		1300	5780	45	720	•			•	•	•			
Sweet Birch		1470	6539	46	735	•			•	•	•			
Pecan		1820	8100	46	735	•			•	•	•			
White Oak		1350	5990	47	755	•			•	•	•			
MDF		VARIES BETWEEN MANUFACTURERS		±48	±750	•			•	•	•			
Hickory		1880	8360	50	800	COMPOSITE FASTENERS WILL NOT DRIVE INTO MATERIALS DENSER THAN HICKORY								
HDF		VARIES BETWEEN MANUFACTURERS		±60	±961	COMPOSITE FASTENERS WILL NOT DRIVE INTO MATERIALS DENSER THAN HICKORY								

* This number is incredibly useful in directly determining how well a wood will withstand dents, dings, and wear -- as well as indirectly predicting the difficulty in nailing, screwing, sanding, or sawing a given wood species.

* The actual number listed in the wood profile is the amount of pounds-force (lbf) or newtons (N) required to imbed a .444" (11.28 mm) diameter steel ball into the wood to half the ball's diameter. This number is given for wood that has been dried to a 12% moisture content, unless otherwise noted.

Data Sources: http://wood-database.com and NER-272-1997