

Density - different materials © NGH 2009

	kg/m ³	kN/m ³
Acetone	790	7,90
Acid, Acetic (Ch3Cooh)	1050	10,50
Acid, Sulfuric (H2So4)	1390	13,90
Admiralty Brass	8525	85,25
Aerated Concrete Slab	500	5,00
Afromosia	705	7,05
Air, 100 K	3,556	0,04
Air, 1000 K	0,340	0,00
Air, 200 K	1,746	0,02
Air, 293 K	1,207	0,01
Air, 300 K	1,161	0,01
Air, 500 K	0,696	0,01
Alcohol, Ethyl (Grain)	789,2	7,89
Alcohol, Isopropyl (Rubbing)	785,4	7,85
Alcohol, Methyl (Wood)	791,3	7,91
Alder	400 - 700	4,00 - 7,00
Aluminum	2700	27,00
Aluminum	2712	27,12
Aluminum - Melted	2560 - 2640	25,60 - 26,40
Aluminum Bronze (3-10% Al)	7700 - 8700	77,00 - 87,00
Aluminum Foil	2700 - 2750	27,00 - 27,50
Ammonia	0,771	0,01
Antifriction Metal	9130 - 10600	91,30 - 106,00
Apple	660 - 830	6,60 - 8,30
Apple	650 - 850	6,50 - 8,50
Argon, Gas, ~300 K	1449	14,49
Argon, Liquid, 87 K	1430	14,30
Asbestos Cement Decking	1500	15,00
Asbestos Cement Sheet	700	7,00
Ash, Black	540	5,40
Ash, Black	540	5,40
Ash, White	670	6,70
Ash, White	650 - 851	6,50 - 8,51
Aspen	420	4,20
Aspen	420	4,20
Asphalt	1700	17,00
Asphalt Crushed	721	7,21
Balsa	170	1,70
Balsa	670	6,70
Bamboo	300 - 400	3,00 - 4,00
Bamboo	1000	10,00
Bank Sand	1483	14,83
Basswood	380	3,80
Beech	380	3,80
Beer, Pilsner, 4 °C	1008	10,08
Benzene	870	8,70
Beryllium	1840	18,40

Gaseous
Liquid
Solid

Beryllium Copper	8100 -	8250	81,00 -	82,50
Birch (British)		670		6,70
Birch, British		490		4,90
Blood		1035		10,35
Blue Gum		410		4,10
Body Fat		918		9,18
Bone		1900		19,00
Box		510		5,10
Brass - Casting	8400 -	8700	84,00 -	87,00
Brass - Rolled And Drawn	8430 -	8730	84,30 -	87,30
Brickwork (Inner Leaf)		1700		17,00
Brickwork (Outer Leaf)		1700		17,00
Bronze - Lead	7700 -	8700	77,00 -	87,00
Bronze - Phosphorous	8780 -	8920	87,80 -	89,20
Bronze (8-14% Sn)	7400 -	8900	74,00 -	89,00
Butane		551		5,51
Butter		911		9,11
Butternut		750		7,50
Carbon		2250		22,50
Carbon Dioxide, Gas, +25 °C		1799		17,99
Carbon Dioxide, Solid, -37 °C		1101		11,01
Cast Concrete (Dense)		2100		21,00
Cast Concrete (Lightweight)		1200		12,00
Cast Iron		7208		72,08
Cast Iron	6800 -	7800	68,00 -	78,00
Cedar, Red		380		3,80
Cedar, Red		530		5,30
Cement Portland		1506		15,06
Chemical Lead		11340		113,40
Cherry		570		5,70
Chestnut		820		8,20
Cobalt		8746		87,46
Concrete Block (Heavyweight)		2300		23,00
Concrete Block (Lightweight)		600		6,00
Concrete Block (Medium Weight)		1400		14,00
Concrete Gravel		2400		24,00
Concrete Limestone W/Portland		2370		23,70
Copper		8960		89,60
Copper		8930		89,30
Corn Starch, Loosely Packed		540		5,40
Corn Starch, Tightly Packed		630		6,30
Corn Syrup		1380		13,80
Cottonwood		590		5,90
Crushed Stone		1600		16,00
Cupronickel		8940		89,40
Cypress		510		5,10
Cypress		820		8,20
Delta Metal		8600		86,00
Diesel		800		8,00
Dogwood		540		5,40

Douglas Fir		530		5,30
Douglas Fir		620		6,20
Earth Loam Dry Excavated		1440		14,40
Earth Packed		1520		15,20
Ebony	960 -	1120	9,60 -	11,20
Ebony		750		7,50
Electrum	8400 -	8900	84,00 -	89,00
Elm (English)		600		6,00
Elm (Rock)		815		8,15
Elm (Wych)		690		6,90
Elm, American		550		5,50
Elm, English		900		9,00
Elm, Rock		740		7,40
Expanded Polystyrene Insulation		24		0,24
Expanded Polystyrene Slab		25		0,25
External Rendering		1300		13,00
Extruded Polystyrene Insulation		29		0,29
Felt/Bitumen Layers		1700		17,00
Fibreboard		300		3,00
Formaldehyde		1130		11,30
Framing Steel		7849		78,49
Freon 12, Liquid		1311		13,11
Freon 12, Vapor		36,83		0,37
Gasoline		803		8,03
Glass Fibre Quilt		12		0,12
Glass Fibre Slab		25		0,25
Glass Window		2580		25,80
Glycerine		1260		12,60
Gold		19,3		0,19
Gold		19320		193,20
Gravel Loose Dry		1520		15,20
Gravel With Sand		1920		19,20
Gum, Black		570		5,70
Gum, Blue		660		6,60
Gum, Red		650		6,50
Hackberry		850		8,50
Hatelloy		9245		92,45
Helium, Gas, ~300 K		0,164		0,00
Helium, Liquid, 4 K		147		1,47
Hickory		660		6,60
Holly		740		7,40
Honey		1420		14,20
Hydrogen (H2), Gas, 300 K		0,082		0,00
Hydrogen (H2), Liquid, 17 K		71		0,71
Ice Crushed		593		5,93
Ice Solid		919		9,19
Incoloy		8027		80,27
Inconel		8497		84,97
Iridium		22,4		0,22
Iroko		655		6,55

Iron		7870		78,70
Iron		7850		78,50
Juniper		770		7,70
Kerosene		810		8,10
Larch		590		5,90
Larch		740		7,40
Lard		919		9,19
Lead		11350		113,50
Lead		11340		113,40
Light Alloy Based On Al	2560 -	2800	25,60 -	28,00
Light Alloy Based On Mg	1760 -	1870	17,60 -	18,70
Lignum Vitae	1280 -	1370	12,80 -	13,70
Lignum Vitae		530		5,30
Limestone		2739		27,39
Lithium		534		5,34
Lithium 6 Deuteride		820		8,20
Locust		560		5,60
Logwood		770		7,70
Lungs		400		4,00
Madrone		900		9,00
Magnesium		1738		17,38
Magnolia		590		5,90
Mahogany (African)	495 -	850	4,95 -	8,50
Mahogany (Honduras)		545		5,45
Mahogany, African		450		4,50
Mahogany, Cuban		510		5,10
Mahogany, Honduras		820		8,20
Mahogany, Spanish		900		9,00
Manganese Bronze		8359		83,59
Maple		755		7,55
Maple		950		9,50
Marble Solid		2560		25,60
Mayonnaise, Light		1000		10,00
Mayonnaise, Traditional		910		9,10
Mercury		13594		135,94
Mercury		13593		135,93
Metal Tray		7800		78,00
Methane, Gas, +25 °C		0,656		0,01
Methane, Liquid, -90 °C		162		1,62
Milk, Cow, Heavy Cream		994		9,94
Milk, Cow, Light Cream		1012		10,12
Milk, Cow, Skim		1033		10,33
Milk, Cow, Whole		1030		10,30
Mineral Fiber Fiberglass Insulation		32		0,32
Mineral Fibre Slab		30		0,30
Molybdenum		10188		101,88
Monel	8360 -	8840	83,60 -	88,40
Monosodium Glutamate		1620		16,20
Mud Packed		1906		19,06
Myrtle		450		4,50

Nickel		8900		89,00
Nickel		8800		88,00
Nickel Silver	8400 -	8900	84,00 -	89,00
Nitrogen (N2), Gas, ~300 K		1,145		0,01
Nitrogen (N2), Liquid, 74 K		808		8,08
Oak	590 -	930	5,90 -	9,30
Oak		450		4,50
Oak, American Red		640		6,40
Oak, American White		980		9,80
Oak, English Brown		740		7,40
Oil, Vegetable, Coconut		924		9,24
Oil, Vegetable, Corn		922		9,22
Oil, Vegetable, Olive		918		9,18
Oil, Vegetable, Palm		915		9,15
Oil, Vegetable, Peanut		914		9,14
Oil, Vegetable, Soya		927		9,27
Oregon Pine		630		6,30
Osmium		22610		226,10
Oxygen (O2), Gas, ~300 K		1,308		0,01
Oxygen (O2), Liquid, 87 K		1155		11,55
Oyster Shells Ground		849		8,49
Parana Pine		490		4,90
Pear		570		5,70
Pecan		1000		10,00
Perchlorethylene		1600		16,00
Persimmon		790		7,90
Phenolic Foam		30		0,30
Philippine Red Luan		590		5,90
Pine (Canadian)	350 -	560	3,50 -	5,60
Pine (Oregon)		530		5,30
Pine (Parana)		560		5,60
Pine (Red)	370 -	660	3,70 -	6,60
Pine, Pitch	800 -	850	8,00 -	8,50
Pine, White	350 -	500	3,50 -	5,00
Pine, Yellow	350 -	600	3,50 -	6,00
Plaster (Dense)		1300		13,00
Plaster (Lightweight)		600		6,00
Plasterboard		950		9,50
Platinum		21,45		0,21
Platinum		21400		214,00
Plum	650 -	800	6,50 -	8,00
Plutonium		19816		198,16
Plutonium, A		19,86		0,20
Polyurethane Board		30		0,30
Polyurethane Insulation		24		0,24
Poplar	350 -	500	3,50 -	5,00
Porcelain		2400		24,00
Red Brass		8746		87,46
Redwood (American)		450		4,50
Redwood (European)		510		5,10

Redwood, American		450		4,50
Redwood, European		510		5,10
Rosewood, Bolivian		820		8,20
Rosewood, East Indian		900		9,00
Salt (Sodium Chloride)		2165		21,65
Sand Dry		1600		16,00
Satinwood		950		9,50
Screed		1200		12,00
Silicon		2330		23,30
Silicon Dioxide (Quartz)		2600		26,00
Silicone		993		9,93
Silver		10,49		0,10
Silver		10490		104,90
Skin		1050		10,50
Snow Compacted		480		4,80
Snow Freshly Fallen		160		1,60
Sodium Bicarbonate		2200		22,00
Solder 50/50 Pb Sn		8885		88,85
Spruce	400 -	700	4,00 -	7,00
Spruce (Canadian)		450		4,50
Spruce (Sitka)		450		4,50
Spruce, Canadian		450		4,50
Spruce, Sitka		450		4,50
Stainless Steel	7480 -	8000	74,80 -	80,00
Steel		7850		78,50
Stone (Artificial)		1750		17,50
Stone (Limestone)		2180		21,80
Stone Chippings		1800		18,00
Sugar, Sucrose		1550		15,50
Sycamore		590		5,90
Sycamore		640		6,40
Tanguile		980		9,80
Tar		1150		11,50
Teak	630 -	720	6,30 -	7,20
Teak, African		630		6,30
Teak, Burma		490		4,90
Teak, Indian		740		7,40
Tile		1900		19,00
Tile Hanging		1900		19,00
Timber Flooring		650		6,50
Tin		7280		72,80
Titanium		4500		45,00
Titanium		4500		45,00
Torpedo Sand		1602		16,02
Tungsten		19300		193,00
Tungsten		19600		196,00
Uranium		19050		190,50
Uranium		18900		189,00
Urea Formaldehyde Foam		10		0,10
Vanadium		5494		54,94

Vermiculite		641		6,41
Walnut		570		5,70
Walnut, Amer Black		1000		10,00
Walnut, Claro		790		7,90
Walnut, European		570		5,70
Water		1000		10,00
Water Gum		1000		10,00
Water, Ice, 0 °C		916		9,16
Water, Ice, -100 °C		927		9,27
Water, Ice, -50 °C		922		9,22
Water, Liquid, 0 °C		999,84		10,00
Water, Liquid, 10 °C		999,7		10,00
Water, Liquid, 100 °C		958,4		9,58
Water, Liquid, 20 °C		998,21		9,98
Water, Liquid, 30 °C		995,65		9,96
Water, Liquid, 4 °C		999,98		10,00
Water, Liquid, 50 °C		988,03		9,88
Water, Sea		1025		10,25
White Metal		7100		71,00
Willow		420		4,20
Willow	400 -	600	4,00 -	6,00
Wood Blocks		650		6,50
Wood Wool Slab		500		5,00
Wool		1310		13,10
Wrought Iron		7750		77,50
Yellow Brass		8470		84,70
Zebrawood		790		7,90
Zinc		7140		71,40
Zinc		7135		71,35