1.6. Conversion of Weights and Measures

1.6.1. Conversion Factors

to convert	*into*	*multiply by*
Centigrade or Celsius	Fahrenheit	9/5ths and add 32 ° F.
Centimetres	Inches	0.3937
Centimetres	Metres	0.0100
Centimetres	Millimetres	10.0000
Cubic feet	Cubic centimetres	28320.0000
Cubic feet	Cubic inches	1728.0000
Cubic feet	Litres	28.3200
Cubic inches	Cubic centimetres	16.38706
Cubic metres	Cubic feet	35.3100
Cubic metres	Cubic inches	61023,3779
Cubic inches	Fluid ounces (Imperial)	0.4614
Cubic inches	Fluid ounces (US)	0.5541
Fahrenheit	Centigrade or Celsius	Subtract 32 ° F and multiply by 5/9ths
Feet	Centimetres	30.4800
Feet	Metres	0.3048
Feet	Inches	12.0000
Fluid ounces (Imperial)	Millilitres	28.4123
Fluid ounces (Imperial)	Pints (Imperial)	0.0500
Fluid ounces (US)	Millilitres	29.5729
Fluid ounces (US)	Pints (US)	0.0625
Grams	Ounces (avoirdupois)	0.353
Imperial gallons	Litres	4.5460
Imperial gallons	US gallons	1.2009
Imperial pints	Fluid ounces (Imperial)	20.0000
Imperial pints	Litres	0.5682
Imperial quarts	Litres	1.1365
Inches	Centimetres	2.5400
Kilograms	Pounds (16 ounces)	2.2046
Kilograms per square centimetre	Pounds per square inch	14.2234
Litres	Fluid ounces (Imperial)	35.1960
Litres	Fluid ounces (US)	33.8147
Litres	Imperial gallons	0.2200
Litres	Imperial pints	1.7598
Litres	Imperial quarts	0.8799
Litres	US gallons	0.2642
Litres	US pints	2.1136
Litres	US quarts	1.0567
Metres	Centimetres	100.0000
Metres	Feet	3.2808
Metres	Inches	39.3700
Metres	Yards	1,093613
Millimetres	Centimetres	0.1000
Millimetres	Inches	0.0394
Ounces (avoirdupois)	Pounds	0.0625
Ounces (avoirdupois)	Grams	28.3495
Pounds	Ounces	16.000
Pounds	Grams	453.5924
Pounds (16 ounces)	Kilograms	0.4536
Pounds per square inch	Kilograms per square centimetre	0.0703
Statute miles	Yards	1760
Statute miles	Feet	5280
Statute miles	Metres	1609.344
Statute miles	Kilometres	1,609344
Tons (long)	Kilograms	1016.000
Tons (long)	Pounds	2240.0000
Tons (long)	Tons (short)	1.1200
Tons (metric)	Kilograms	1000.0000
Tons (metric)	Pounds	2205.0000
Tons (short)	Pounds	2000.0000
Tons (short)	Kilograms	907.1849
Tons (short)	Tons (long)	0.8929
Tons (short)	Tons (metric)	0.9072
US gallons	Imperial gallons	0.8327
US gallons	Litres	3.7853
US pints	Fluid ounces (US)	16.0000
US pints	Litres	0.4732
US quarts	Litres	0.9463
Yards	Feet	3
Yards	Metres	0.9144

1.6.2. Quick Rate Conversion Table

a. For conversion of **rates** per pound to **rates** per kilogram read right from center column “X” and round off fractions to the nearer whole cent.
b. For conversions of **kilograms** to **pounds** read right from center column “X” and round up fractions (see example b) to next higher pound.
c. For conversion of **pounds** to **kilograms** read to left from center column “X”, round fractions of 4 or less to next higher ½ kg.; and fractions of 5 and above round up to next higher whole kg. (see example c.)

Examples:

a. To find the **rate** per kilogram for a consignment for which the rate in cents is 30 cents per lb., find 30 in the center column “X”: the figure in the right hand column, 66.1, is the rate per kg. (rounded = 66 cents per kg.).
b. For a parcel weighing 40 kg. the figure in the column on the right of 40 in column “X” is the weight in lb. 88.1 (rounded-up = 89 lb.).
c. To find the **weight** in kilograms of a parcel weighing 40 lb., find 40 in the center column “X” and the figure in the left hand column, 18.1 is the weight in kilograms (rounded = 18½ kg.)

Note:
This table may only be used to convert rates published per lb. (such as U.S. Domestic rates) into rates per kg.
For construction of international rates per lb. the conversion table on the inside back cover should be used.
The table below can also be used to convert kg. into lb. or lb. into kg.

	X			X			X	
0.4	1	2.2	18.5	41	90.3	35.8	79	174.1
0.9	2	4.4	19.0	42	92.5	36.2	80	176.3
1.3	3	6.6	19.5	43	94.7	36.7	81	178.5
1.8	4	8.8	19.9	44	97.0	37.1	82	180.7
2.2	5	11.0	20.4	45	99.2	37.6	83	182.9
2.7	6	13.2	20.8	46	101.4	38.1	84	185.1
3.1	7	15.4	21.3	47	103.6	38.5	85	187.3
3.6	8	17.6	21.7	48	105.8	39.0	86	189.5
4.0	9	19.8	22.2	49	108.0	39.4	87	191.8
4.5	10	22.0	22.6	50	110.2	39.9	88	194.0
4.9	11	24.2	23.1	51	112.4	40.3	89	196.2
5.4	12	26.4	23.5	52	114.6	40.8	90	198.4
5.8	13	28.6	24.0	53	116.8	41.2	91	200.6
6.3	14	30.8	24.4	54	119.0	41.7	92	202.8
6.8	15	33.0	24.9	55	121.1	42.1	93	205.0
7.2	16	35.2	25.4	56	123.4	42.6	94	207.2
7.7	17	37.4	25.8	57	125.6	43.0	95	209.4
8.1	18	39.6	26.3	58	127.8	43.5	96	211.6
8.6	19	41.8	26.7	59	130.0	43.9	97	213.8
9.0	20	44.0	27.2	60	132.2	44.4	98	216.0
9.5	21	46.2	27.6	61	134.4	44.9	99	218.2
9.9	22	48.5	28.1	62	136.6	45.3	100	220.4
10.4	23	50.7	28.5	63	138.8	56.6	125	275.5
10.8	24	52.9	29.0	64	141.0	68.0	150	330.6
11.3	25	55.1	29.4	65	143.3	79.3	175	385.8
11.7	26	57.3	29.9	66	145.5	90.7	200	440.9
12.2	27	59.5	30.3	67	147.7	102.0	225	496.0
12.7	28	61.7	30.8	68	149.9	113.3	250	551.1
13.1	29	63.9	31.2	69	152.1	124.7	275	606.2
13.6	30	66.1	31.7	70	154.3	136.0	300	661.3
14.0	31	68.3	32.2	71	156.5	147.4	325	716.5
14.5	32	70.5	32.6	72	158.7	158.7	350	771.6
14.9	33	72.7	33.1	73	160.9	170.0	375	826.7
15.4	34	74.9	33.5	74	163.1	181.4	400	881.8
15.8	35	77.1	34.0	75	165.3	192.7	425	936.9
16.3	36	79.3	34.4	76	167.5	204.1	450	992.0
16.9	37	81.5	34.9	77	169.7	215.4	475	1047.1
17.2	38	83.7	35.3	78	171.9	226.7	500	1102.3
17.6	39	85.9						
18.1	40	88.1						

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