

451-174 to 451-216

DIMENSIONAL DATA

Metric Beryllium Copper Crinkle Washers to BS 4463

Dimensions in mm

Bolt size	Internal diameter		External diameter		Height		Thickness nom
	maximum	minimum	maximum	minimum	maximum	minimum	
M1.6	1.80	1.7	3.7	3.52	0.51	0.36	0.16
M2	2.30	2.2	4.6	4.42	0.53	0.38	0.16
451-174 (M2.2)	2.50	2.4	5.2	5.02	0.53	0.38	0.16
M2.5	2.80	2.7	5.8	5.62	0.53	0.38	0.16
M3	3.32	3.2	6.4	6.18	0.61	0.46	0.16
(M3.5)	3.82	3.7	6.9	6.68	0.79	0.63	0.20
M4	4.42	4.3	8.1	7.88	0.84	0.69	0.28
M5	5.42	5.3	9.2	8.98	0.89	0.74	0.30
M6	6.55	6.4	11.5	11.23	1.14	0.99	0.40
M8	8.55	8.4	15.0	14.73	1.40	1.25	0.40
M10	10.68	10.5	19.6	19.27	1.70	1.55	0.55
M12	13.18	13.0	22.0	21.67	1.90	1.65	0.55
(M14)	15.18	15.0	25.5	25.17	2.06	1.80	0.55
M16	17.18	17.0	27.8	27.47	2.41	2.16	0.70
(M18)	19.21	19.0	31.3	30.91	2.41	2.16	0.70
M20	21.21	21.0	34.7	34.31	2.66	2.16	0.70

Sizes in parenthesis are non-preferred.