

**Tab. 3 Dimensions and Tolerances – Precision tubes acc. DIN 2391 & EN 10305 & ASTM A179**

WT			1.5	1.8	2.0	2.2	2.5	2.8	3.0	3.5	4.0	4.5
			0.059	0.071	0.079	0.087	0.098	0.110	0.118	0.138	0.157	0.177
OD			ID									
mm	in	toler.										
15.88	0.625	±.08	12.88±.08	12.28±.15	11.88±.15	11.48±.15	10.88±.15					
17.1	0.673	±.08	14.1±.08	13.5±.08	13.1±.08	12.7±.15	12.1±.15					
19.05	0.750	±.08	16.05±.08	15.45±.08	15.05±.08	14.65±.15	14.05±.15	13.45±.15				
20	0.787	±.08	17±.08	16.4±.08	16±.08	15.6±.08	15±.15	14.4±.15	14±.15	13±.15	12±.15	11±.15
22	0.866	±.08	19±.08	18.4±.08	18±.08	17.6±.08	17±.08	16.4±.15	16±.15	15±.15	14±.15	13±.15
25.4	1.000	±.08	22.4±.08	21.8±.08	21.4±.08	21±.08	20.4±.08	19.8±.15	19.4±.15	18.4±.15	17.4±.15	16.4±.15
28	1.102	±.08	25±.08	24.4±.08	24±.08	23.6±.08	23±.08	22.4±.08	22±.15	21±.15	20±.15	19±.15
30	1.181	±.08	27±.08	26.4±.08	26±.08	25.6±.08	25±.08	24.4±.08	24±.15	23±.15	22±.15	21±.15
32	1.260	±.15		28.4±.15	28±.15	27.6±.15	27±.15	26.4±.15	26±.15	25±.15	24±.15	23±.15
35	1.378	±.15			31±.15	30.6±.15	30±.15	29.4±.15	29±.15	28±.15	27±.15	26±.15
38	1.496	±.15						32.4±.15	32±.15	31±.15	30±.15	29±.15
40	1.575	±.15							34±.15	33±.15	32±.15	31±.15
42	1.654	±.20							36±.20	35±.20	34±.20	33±.20
45	1.772	±.20							39±.20	38±.20	37±.20	36±.20
48	1.890	±.20							42±.20	41±.20	40±.20	39±.20
50	1.969	±.20							44±.20	43±.20	42±.20	41±.20
55	2.165	±.25							49±.25	48±.25	47±.25	46±.25
60	2.362	±.25									52±.25	51±.25
65	2.559	±.30									57±.30	56±.30
70	2.756	±.30									62±.30	61±.30

WT			5	5.5	6	7	8	9	10	12	14
			0.197	0.217	0.236	0.276	0.315	0.354	0.394	0.472	0.551
OD			ID								
mm	in	toler.									
20	0.787	±.08	10±.15								
22	0.866	±.08	12±.15								
25.4	1.000	±.08	15.4±.15	14.4±.15	13.4±.15						
26	1.024	±.08	16±.15	15±.15	14±.15	12±.15					
28	1.102	±.08	18±.15	17±.15	16±.15	14±.15	12±.15				
30	1.181	±.08	20±.15	19±.15	18±.15	16±.15	14±.15				
32	1.260	±.15	22±.15	21±.15	20±.15	18±.15	16±.15				
35	1.378	±.15	25±.15	24±.15	23±.15	21±.15	19±.15	17±.15	15±.15		
38	1.496	±.15	28±.15	27±.15	26±.15	24±.15	22±.15	20±.15	18±.15		
40	1.575	±.15	30±.15	29±.15	28±.15	26±.15	24±.15	22±.15	20±.15		
42	1.654	±.20	32±.20	31±.20	30±.20	28±.20	26±.20	24±.20	22±.20		
45	1.772	±.20	35±.20	34±.20	33±.20	31±.20	29±.20	27±.20	25±.20		
48	1.890	±.20	38±.20	37±.20	36±.20	34±.20	32±.20	30±.20	28±.20		
50	1.969	±.20	40±.20	39±.20	38±.20	36±.20	34±.20	32±.20	30±.20		
55	2.165	±.25	45±.25	44±.25	43±.25	41±.25	39±.25	37±.25	35±.25	31±.30	
60	2.362	±.25	50±.25	49±.25	48±.25	46±.25	44±.25	42±.25	40±.25	36±.30	
65	2.559	±.30	55±.30	54±.30	53±.30	51±.30	49±.30	47±.30	45±.30	41±.30	
70	2.756	±.30	60±.30	59±.30	58±.30	56±.30	54±.30	52±.30	50±.30	46±.30	
75	2.953	±.35	65±.35	64±.35	63±.35	61±.35	59±.35	57±.35	55±.35	51±.35	
80	3.150	±.35	70±.35	69±.35	68±.35	66±.35	64±.35	62±.35	60±.35	56±.35	52±.35
85	3.346	±.40	75±.40	74±.40	73±.40	71±.40	69±.40	67±.40	65±.40	61±.40	57±.40
90	3.543	±.40	80±.40	79±.40	78±.40	76±.40	74±.40	72±.40	70±.40	66±.40	62±.40
95	3.740	±.45			83±.45	81±.45	79±.45	77±.45	75±.45	71±.45	67±.45
100	3.937	±.45			88±.45	86±.45	84±.45	82±.45	80±.45	76±.45	72±.45
110	4.331	±.50				96±.50	94±.50	92±.50	90±.50	86±.50	82±.50

WT			7	8	9	10	12	14	16	18	20
			.079	.087	.098	.110	.118	.138	.157	.177	.197
OD			ID								
mm	in	toler.									
120	4.724	±.50	106±.50	104±.50	102±.50	100±.50	96±.50	92±.50	88±.50	84±.50	
130	5.118	±.70	116±.70	114±.70	112±.70	110±.70	106±.70	102±.70	98±.70	94±.70	
140	5.512	±.70	126±.70	124±.70	122±.70	120±.70	116±.70	112±.70	108±.70	104±.70	
150	5.906	±.80		134±.80	132±.80	130±.80	126±.80	122±.80	118±.80	114±.80	
160	6.299	±.80				140±.80	136±.80	132±.80	128±.80	124±.80	120±.80
170	6.693	±.90				150±.90	146±.90	142±.90	138±.90	134±.90	130±.90
180	7.087	±.90				160±.90	156±.90	152±.90	148±.90	144±.90	140±.90
190	7.480	±1.0				170±1.0	166±1.0	162±1.0	158±1.0	154±1.0	150±1.0
200	7.874	±1.0					176±1.0	172±1.0	168±1.0	164±1.0	160±1.0
210	8.268	±1.2							178±1.2	174±1.2	170±1.2

**Notes:**  
 1. Tolerances from above table are available on by in BK, BK+S condition;  
 2. Intermediate sizes can be produced subject of agreement before ordering.