



ELANTAS Beck India Ltd

HEAT BONDING TEST METHOD AND REQUIREMENTS FOR ENAMELLED ROUND COPPER WINDING WIRES (BASIS : IS 13730-2 and IS 13778-3)

Nominal Wire Size				Specimen preparation		Bond strength requirements
mm		SWG		Mandrel	Load on coil during bonding (N)	For solderable wires Class 130 with bonding layer (N)
Over	Up to & incl.	From	Up to	mm		
0.05	0.071	47	45	1	0.05	0.05
0.071	0.1	44	43	1	0.05	0.08
0.1	0.16	42	38	1	0.15	0.12
0.16	0.2	37	36	1	0.25	0.25
0.2	0.315	35	30	2	0.35	0.35
0.315	0.4	29	28	3	0.5	0.7
0.4	0.5	27	26	4	0.75	1.1
0.5	0.63	25	23	5	1.25	1.6
0.63	0.71	-	-	6	1.75	2.2
0.71	0.8	22	22	7	2	2.8
0.8	0.9	21	21	8	2.5	3.4
0.9	1	20	20	9	3.25	4.2
1	1.12	19	19	10	4	5
1.12	1.25	19	18	11	4.5	5.8
1.25	1.4	-	-	12	5.5	6.5
1.4	1.6	17	-	14	6.5	8.5
1.6	1.8	16	-	16	8	10.5
1.8	1.2	15	-	18	10	10.5

Note : 1N = 0.102 kg