

250°C CABLE

High Temperature

Flexible nickel plated annealed copper conductor, PTFE (Polytetrafluorethylene) insulated, mica/glass taped, glass fibre braided and varnished overall. 600/1000 volts grade.

SIZE SQ.MM	DIAMETER OVER CONDUCTOR MM	RT OF INSULATION MM	NOMINAL OVERALL DIAMETER MM	WEIGHT KG/KM
1.5	1.6	1.2	4.1	34
2.5	2.0	1.2	4.5	46
4	2.6	1.2	5.1	63
6	3.3	1.2	5.8	87
10	4.2	1.2	6.7	128
16	5.3	1.7	8.7	212
25	6.6	1.9	10.5	310

Conductor Stranding: Class 5 flexible

Operating temperature: Maximum 250°C. Minimum flexing -40°C

Minimum bending radius: 10 x overall diameter

CURRENT RATINGS

CABLE will operate at a continuous conductor temperature of 250°C and in circumstances where the cable is not exposed to touch and does not run in contact with or near the vicinity of heat sensitive materials, this enables it to be run at high ratings. Under these conditions, it may be necessary to consider special fusing arrangements and, as volt drop and power losses in the cable will be high, this should be allowed for within installations. Current ratings for this situation are given in Table 1, below.

TABLE 1		
CONDUCTOR AREA SQ.MM	RESISTANCE AT 20°C OHM/KM	MAX ALLOWABLE CURRENT AT 30°C AMBIENT TEMP AMP
1.5	13.00	40
2.5	7.82	54
4	4.85	74
6	3.23	98
10	1.85	135
16	1.18	180
25	0.757	240

TABLE 1

These ratings apply to single cables freely ventilated in air - for higher ambient temperatures, the derating factors in Table 2 must be applied and in addition, where cables are grouped, the derating factors from Table 3 must be applied. When cables are grouped in ambient temperatures higher than 30°C both factors must be applied

TABLE 2											
TEMPERATURE RATING FACTORS											
Ambient Temp °C	40	60	80	100	120	140	160	180	200	220	240
Rating Factor	0.98	0.93	0.88	0.83	0.77	0.71	0.64	0.56	0.48	0.31	0.20

Date created: 02.04.2003

Telephone: +44 (0)121 508 6890

Fax: +44 (0)121 508 6891

Web: www.cablesbritain.com

Email: sales@cablesbritain.com