General Cable

**EXTERNAL TELEPHONE DISTRIBUTION**

| | | | |
|---|---|---|---|
| **APPLICATION**<br><br>External distribution cable, for transmission of digital or analogue signals. Cable may be installed by hauling into underground conduit or pipe, or burying directly into the ground.<br><br>Suitable for glanding.<br><br>**COLOUR CODE**<br><br>Subunits colour coded as per page 2. | | **STANDARD** | To Telecom NZ Specifications. |
| | | **APPROVALS** | Telecom NZ |
| | | **CONDUCTOR** | Plain annealed Copper |
| | | **INSULATION** | Cellular Polyethylene |
| | | **FILLING COMPOUND** | Petroleum Jelly |
| | | **SHEATH** | Linear Low Density Polyethylene |

| Item Number | Type | Conductor | | Approx. Mass | Standard Packing | Surefit Cable Glands (a) | |
|---|---|---|---|---|---|---|---|
| | | Number of Pairs | Number & Diameter of Wires (No./mm) | kg/km | 500m | GPHM | GWPM |
| 68240016 | Ext 154 | 15 | 1/0.40 | 80 | ✓ | 16B | 1 |
| 68340016 | Ext 504H | 50 | 1/0.40 | 250 | ✓ | 20B | 1B-25 |
| 68370016 | Ext 014H | 100 | 1/0.40 | 440 | ✓ | 25 | 2A-32 |
| 68417016 | Ext 204 | 200 | 1/0.40 | 750 | ✓ | 32 | 3 |
| 68440016 | Ext 404 | 400 | 1/0.40 | 1410 | ✓ | 40 | 4A |
| 68750016 | Ext 076 | 7 | 1/0.63 | 85 | ✓ | 16B | 1 |
| 68760016 | Ext 156 | 15 | 1/0.63 | 145 | ✓ | 16B | 1A |
| 69060016 | Ext 256 | 25 | 1/0.63 | 260 | ✓ | 25 | 2 |
| 69115016 | Ext 506 | 50 | 1/0.63 | 470 | ✓ | 25 | 2A-32 |
| 69160016 | Ext 016 | 100 | 1/0.63 | 910 | ✓ | 32 | 3A |
| 69225016 | Ext 206 | 200 | 1/0.63 | 1685 | ✓ | 40 | 4A |

H – High Density Polyethylene (HDPE) sheath.
(a) To be used as a guide only. We recommend that actual rather than theoretical dimensions are used when selecting a gland.

| Type | Number of Pairs | Insulation Thickness mm | Nominal Overall Diameter mm | Minimum installed bending radius mm | Maximum pulling tension (a) kN |
|---|---|---|---|---|---|
| Ext 154 | 15 | 0.20 | 8.1 | 85 | 0.26 |
| Ext 504H | 50 | 0.20 | 13.5 | 135 | 0.88 |
| Ext 014H | 100 | 0.20 | 18.1 | 185 | 1.76 |
| Ext 204 | 200 | 0.20 | 21.9 | 220 | 3.52 |
| Ext 404 | 400 | 0.20 | 30.5 | 305 | 7.04 |
| Ext 076 | 7 | 0.25 | 8.2 | 85 | 0.31 |
| Ext 156 | 15 | 0.25 | 10.3 | 110 | 0.65 |
| Ext 256 | 25 | 0.25 | 13.9 | 140 | 1.09 |
| Ext 506 | 50 | 0.25 | 18.1 | 185 | 2.18 |
| Ext 016 | 100 | 0.25 | 25.1 | 240 | 4.36 |
| Ext 206 | 200 | 0.25 | 32.7 | 335 | 8.73 |

(a) Based on a copper strength of 70N/mm².

| ELECTRICAL CHARACTERISTICS | | | |
|---|---|---|---|
| Property | Value | | Units |
| Conductor Diameter | 0.40 | 0.63 | mm |
| DC Conductor Resistance @ 20°C | 143 | 58 | Ω/km |
| Minimum insulation Resistance @ 20°C | 6500 | 6500 | MΩ/km |
| Maximum recommended voltage | 110 | 110 | VDC |
| Capacitance between wires of a pair | 56 | 56 | nF/km |
| Capacitance Unbalance maximum at 1 kHz | 120 | 120 | nF/km |

| COLOUR CODE * | | | | | |
|---|---|---|---|---|---|
| Pair No. | Wire 1 | Wire 2 | Pair No. | Wire 1 | Wire 2 |
| 1 | White | Blue | 14 | Black | Brown |
| 2 | White | Orange | 15 | Black | Grey |
| 3 | White | Green | 16 | Yellow | Blue |
| 4 | White | Brown | 17 | Yellow | Orange |
| 5 | White | Grey | 18 | Yellow | Green |
| 6 | Red | Blue | 19 | Yellow | Brown |
| 7 | Red | Orange | 20 | Yellow | Grey |
| 8 | Red | Green | 21 | Violet | Blue |
| 9 | Red | Brown | 22 | Violet | Orange |
| 10 | Red | Grey | 23 | Violet | Green |
| 11 | Black | Blue | 24 | Violet | Brown |
| 12 | Black | Orange | 25 | Violet | Grey |
| 13 | Black | Green | | | |

* Larger pair counts are made up from sub-units of no more than 25 pairs.

**NOTE:** All cables are subject during manufacture to in-process spark testing at 2kV DC
All cables are tested between each conductor and screens earthed at 2kV DC
These cables are not to be regarded as power cables or for the direct connection of equipment to mains power supplies
Values are nominal unless otherwise specified.

2.1.5.1.1


General Cable New Zealand Ltd
HEAD OFFICE
75-89 Main South Rd
PO Box 8044
Riccarton
Christchurch
Ph: (03) 348 5199
Fax: (03) 348 2009
Website: www.generalcable.co.nz

South Island Customer Services
75-89 Main South Rd
PO Box 8044
Riccarton
Christchurch
Ph: (03) 341 3500
Fax: (03) 341 0844
Free Fax (Orders): 0800 242 267

Auckland Service Centre
14-18 Vestey Drive
PO Box 22-160
Otahuhu
Auckland
Ph: (09) 276 1020
Fax: (09) 276 1028

Wellington Service Centre
22 Barnes St
PO Box 38-271
Petone
Wellington
Ph: 0800 222-537
Ph: 0800 CABLES
Fax: 0800 242-267


Diagrams of cables are illustrative only and are not necessarily to scale.