

# SPECIFICATION CONTROL DRAWING

**55PC0211**

TITLE WIRE, RADIATION-CROSSLINKED, MODIFIED, ETFE-INSULATED,  
GENERAL PURPOSE, LIGHT AIRFRAME

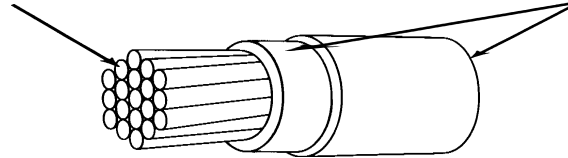
Date 07-08-04

Revision H

This specification sheet forms a part of the latest issue of Raychem Specification 55PC.

CONDUCTOR - TIN-COATED COPPER

INSULATION - RADIATION-CROSSLINKED,  
MODIFIED ETFE



## CONSTRUCTION DETAILS

| CONSTRUCTION DETAILS |                       |  |                              |                 |                        |   |                     |                 |                     |                            |                    |
|----------------------|-----------------------|--|------------------------------|-----------------|------------------------|---|---------------------|-----------------|---------------------|----------------------------|--------------------|
| PART NUMBER<br>1/    | WIRE<br>SIZE<br>(AWG) | CONDUCTOR<br>STRANDING<br>(number x AWG) | CONDUCTOR DIAMETER<br>( in.) |                 |                        | FINISHED WIRE                                       |                     |                 |                     |                            |                    |
|                      |                       |  | LOWER<br>SPEC<br>LIMIT       | TARGET<br>VALUE | UPPER<br>SPEC<br>LIMIT | MAXIMUM<br>RESISTANCE<br>AT 20°C<br>(ohms/1000 ft.) | DIAMETER<br>( in.)  |                 |                     | WEIGHT<br>( lbs/1000 ft. ) |                    |
|                      |                       |  |                              |                 |                        |   | LOWER SPEC<br>LIMIT | TARGET<br>VALUE | UPPER SPEC<br>LIMIT | TARGET<br>VALUE            | UPPERSPEC<br>LIMIT |
| 55PC0211-26-*        | 26                    | 19 x 38                                  | .0175                        | .0183           | .0191                  | 41.3  | .0328               | .0345           | .0362               | 1.38                       | 1.52               |
| 55PC0211-24-*        | 24                    | 19 x 36                                  | .0225                        | .0233           | .0241                  | 26.2  | .0378               | .0395           | .0412               | 1.98                       | 2.13               |
| 55PC0211-22-*        | 22                    | 19 x 34                                  | .0285                        | .0293           | .0301                  | 16.2  | .0438               | .0455           | .0472               | 2.90                       | 3.06               |
| 55PC0211-20-*        | 20                    | 19 x 32                                  | .0365                        | .0375           | .0385                  | 9.88  | .0523               | .0540           | .0557               | 4.38                       | 4.57               |
| 55PC0211-18-*        | 18                    | 19 x 30                                  | .0452                        | .0464           | .0476                  | 6.23  | .0616               | .0635           | .0654               | 6.59                       | 6.90               |
| 55PC0211-16-*        | 16                    | 19 x 29                                  | .0514                        | .0527           | .0538                  | 4.81  | .0690               | .0710           | .0730               | 8.37                       | 8.70               |
| 55PC0211-14-*        | 14                    | 19 x 27                                  | .0644                        | .0659           | .0674                  | 3.06  | .0838               | .0860           | .0882               | 12.88                      | 13.33              |
| 55PC0211-12-*        | 12                    | 37 x 28                                  | .0825                        | .0845           | .0865                  | 2.02  | .1020               | .1047           | .1074               | 19.73                      | 20.30              |
| 55PC0211-10-*        | 10                    | 37 x 26                                  | .1050                        | .1070           | .1090                  | 1.26  | .1252               | .1290           | .1328               | 31.12                      | 32.13              |
| 55PC0211- 8-*        | 8                     | 133 x 29                                 | .158                         | .163            | .169                   | .701  | .188                | .196            | .203                | 56.8                       | 59.9               |
| 55PC0211- 6-*        | 6                     | 133 x 27                                 | .198                         | .205            | .212                   | .445  | .233                | .242            | .251                | 89.7                       | 94.7               |
| 55PC0211- 4-*        | 4                     | 133 x 25                                 | .250                         | .260            | .268                   | .280  | .300                | .311            | .322                | 145.                       | 154.               |
| 55PC0211- 2-*        | 2                     | 665 x 30                                 | .320                         | .330            | .340                   | .183  | .370                | .383            | .397                | 227.                       | 240.               |
| 55PC0211- 1-*        | 1                     | 817 x 30                                 | .360                         | .370            | .380                   | .152  | .410                | .424            | .438                | 278.                       | 291.               |
| 55PC0211- 0-*        | 0                     | 1045 x 30                                | .395                         | .415            | .425                   | .116  | .449                | .466            | .483                | 343.                       | 366.               |
| 55PC0211-00-*        | 00                    | 1330 x 30                                | .440                         | .462            | .475                   | .091  | .505                | .525            | .545                | 450.                       | 481.               |

## WIRE RATINGS AND ADDITIONAL REQUIREMENTS

TEMPERATURE RATING: 150°C

Maximum continuous conductor temperature

VOLTAGE RATING: 600 volts (rms) at sea level

COLOR: White preferred

CROSSLINK VERIFICATION: 300 ± 3°C for 1 hour

IDENTIFICATION AND COLOR STRIPING DURABILITY:

125 cycles (250 strokes) (minimum), 500 g weight

INSULATION ELONGATION AND TENSILE STRENGTH:

Total Insulation,

Elongation, 50% (minimum)

Tensile Strength, 5000 lbf/in<sup>2</sup> (minimum)

INSULATION FLAWS:

Spark Test, 3.0 kV (rms)

Impulse Dielectric Test, 8.0 kV (peak)

INSULATION THICKNESS: .008 in. (nominal) total insulation

SHRINKAGE: 230 ± 3°C for 1 hour, 0.125 in. (maximum) in 12 in.

VOLTAGE WITHSTAND TEST (Post Environmental):

2500 volts (rms)

PART NUMBER:

The "\*" in the part numbers above shall be replaced by color code designators.

1/ Example: AWG 22, white: 55PC0211-22-9

AWG 22, white with black stripe: 55PC0211-22-90

Users should evaluate the suitability of this product for their application. Specifications are subject to change without notice.  
Tyco Electronics also reserves the right to make changes in materials or processing, which do not affect compliance with any specification, without notification to Buyer.

1/ COLORS AND COLOR CODE DESIGNATORS SHALL BE IN ACCORDANCE WITH MIL-STD-681. OTHER CODES AND SUFFIXES MAY BE ADDED TO THE PART NUMBER, AS NECESSARY, TO CAPTURE ANY ADDITIONAL REQUIREMENTS IMPOSED BY THE PURCHASE ORDER.

DIMENSIONS ARE IN INCHES AND, UNLESS OTHERWISE DESIGNATED, ARE NOMINAL

THIS SPECIFICATION SHEET TAKES PRECEDENCE OVER DOCUMENTS REFERENCED HEREIN.  
REFERENCED DOCUMENTS SHALL BE OF THE ISSUE IN EFFECT ON DATE OF INVITATION FOR BID.

**tyco**  
Electronics

**Raychem** Wire & Cable  
501 Oaks Avenue  
Redwood City, CA 94063-3800  
Phone: 1-800-227-8816  
Fax: 1-650-361-6297

# Mouser Electronics

Authorized Distributor

Click to View Pricing, Inventory, Delivery & Lifecycle Information:

## TE Connectivity:

[55PC0211-18-9CS2970](#) [55PC0211-16-9-F940](#) [55PC0211-20-3](#) [55PC0211-18-9CS3071](#) [55PC0211-16-9CS3071](#)  
[55PC0211-16-3](#) [55PC0211-18-92CS2970](#) [55PC0211-18-6CS2502](#)