

RMC200 Q4 Cable

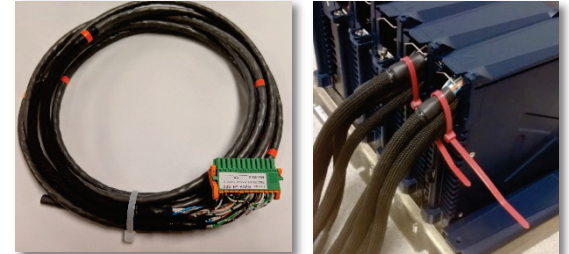
R2-CB-Q4-nnA Installation and Wiring

Pigtail cables provide a compact, convenient option for RMC200 modules. These cables are for short distances between the RMC200 and terminal blocks within the same cabinet. For long cable runs, Delta recommends using cables with lower resistance and better shielding.

Supplied Components

The **R2-CB-Q4-nnA** part number denotes a single cable assembly. The Q4 module requires two R2-CB-Q4-nnA cable assemblies – one per terminal block. Each cable assembly consists of:

- Terminal block connector
- Two cables, both wired to the single terminal block connector
- Flexible cable leader for easy bending out of module
- Pigtail ends



Cable specifications:

- Length: nn = 06: 6 ft (1.83 m); nn = 12: 12 ft (3.66 m) (other lengths available)
- Belden 1422A or equivalent
- OD: 0.294 in; min. bend radius: 3.0 in.
- 5 twisted pairs, overall foil shield, 24 AWG stranded
- Impedance: 100 Ohms; Capacitance 13 pf/ft; Resistance: 24 Ohms/1000 ft
- PVC jacket, -20 to 80 °C

Q4 Cable Wiring Notes

- All inputs share the same common potential and all sensor commons must be tied together at some point in the system (typically, they will share a power supply, which would take care of this requirement).
- The Cmn wire associated with the Hm input is the encoder common. The Hm inputs are referenced to the encoder common. The Reg inputs are fully independant and isolated.
- Shields from each individual sensor cable should be terminated at the separate terminal blocks with a low impedance connection to ground.
- Delta recommends the use of ferrules with these cables.

Q4 Cable Pin-out

TB1 Cable A: Inputs 0

Color Pairs	Pin
Wht w/ Blu	A0+
Blu w/ Wht	A0-
Wht w/ Org	B0+
Org w/ Wht	B0-
Wht w/ Grn	Z0+
Grn w/ Wht	Z0-
Wht w/ Gry	Hm0
Gry w/ Wht	Cmn
Wht w/ Brn	Reg0+
Brn w/ Wht	Reg0-

TB1 Cable B: Inputs 1

Color Pairs	Pin
Wht w/ Blu	A1+
Blu w/ Wht	A1-
Wht w/ Org	B1+
Org w/ Wht	B1-
Wht w/ Grn	Z1+
Grn w/ Wht	Z1-
Wht w/ Gry	Hm1
Gry w/ Wht	Cmn
Wht w/ Brn	Reg1+
Brn w/ Wht	Reg1-

TB2 Cable A: Inputs 2

Color Pairs	Pin
Wht w/ Blu	A2+
Blu w/ Wht	A2-
Wht w/ Org	B2+
Org w/ Wht	B2-
Wht w/ Grn	Z2+
Grn w/ Wht	Z2-
Wht w/ Gry	Hm2
Gry w/ Wht	Cmn
Wht w/ Brn	Reg2+
Brn w/ Wht	Reg2-

TB2 Cable B: Inputs 3

Color Pairs	Pin
Wht w/ Blu	A3+
Blu w/ Wht	A3-
Wht w/ Org	B3+
Org w/ Wht	B3-
Wht w/ Grn	Z3+
Grn w/ Wht	Z3-
Wht w/ Gry	Hm3
Gry w/ Wht	Cmn
Wht w/ Brn	Reg3+
Brn w/ Wht	Reg3-



No band



Marked with orange band



No band

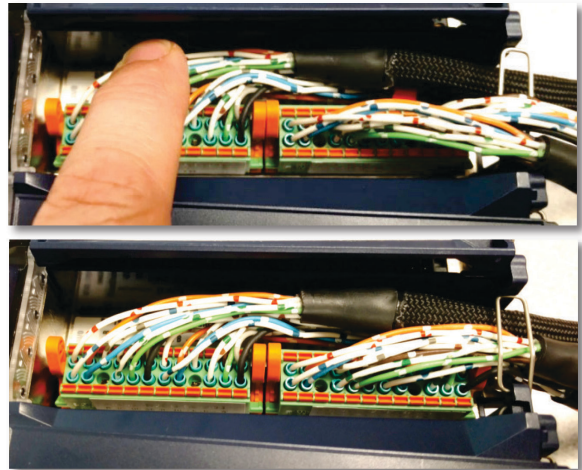


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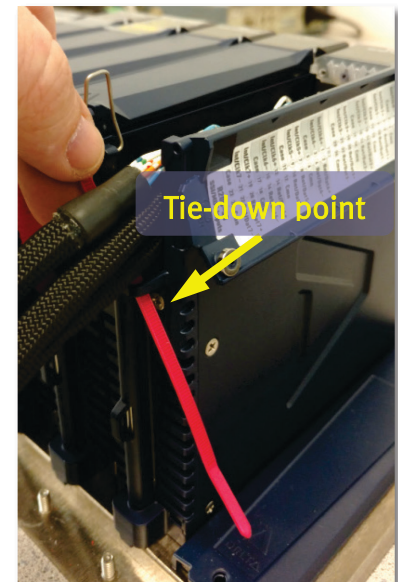
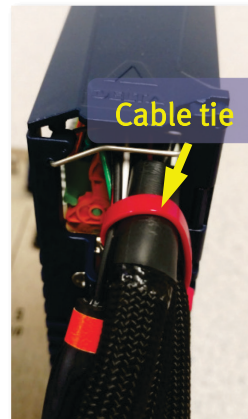


Installation Procedure

1. Insert the terminal block connectors for each cable assembly into the Q4 module, tucking the upper cable into the groove:



2. Use a cable tie to attach all cables exiting module to the tie down location shown. This ensures that module door will close properly. The cable tie should clamp onto the heat shrink tubing. Do not overtighten.



3. Connect the pigtail ends to terminal blocks as required by the application. Delta recommends the use of ferrules.

RS-422 Wiring

Each Q4 transducer input consists of RS-422 inputs. It is important to make sure the Cmn pin on the Q4 is connected to the sensor common. Although the Q4 may properly receive sensor signals without the common, the risk for intermittent errors or complete errors later is very high if the common is not connected properly.

