

Wiring Solutions

Wiring Solutions using the **ZIP**Link Wiring System

ZIPLinks eliminate the normally tedious process of wiring between devices by utilizing prewired cables and DIN rail mount connector modules. It's as simple as plugging in a cable connector at either end or terminating wires at only one end. Prewired cables keep

installation clean and efficient, using half the space at a fraction of the cost of standard terminal blocks. There are several wiring solutions available when using the **ZIP**Link System ranging from

PLC I/O-to-**ZIP**Link Connector Modules that are ready for field termination, options for connecting to third party devices, GS, DuraPulse and SureServo Drives, and specialty relay, transorb and communications modules. Pre-printed I/O-specific adhesive label strips for quick marking of **ZIP**Link modules are provided with **ZIP**Link cables. See the following solutions to help determine the best **ZIP**Link system for your application.

Solution 1: DirectLOGIC I/O Modules to ZIPLink Connector Modules

When looking for quick and easy I/O-to-field termination, a **ZIP**Link connector module used in conjunction with a prewired **ZIP**Link cable, consisting of an I/O terminal block at one end and a multi-pin connector at the other end, is the best solution.

Using the PLC I/O Modules to **ZIP**Link Connector Modules selector tables located in this section,

- 1. Locate your I/O module/PLC.
- 2. Select a ZIPLink module.
- 3. Select a corresponding **ZIP**Link cable.



Solution 2: DirectLOGIC I/O Modules to 3rd Party Devices

For connecting I/O to another device within close proximity of the I/O modules, no extra terminal blocks are necessary when using the **ZIP**Link Pigtail Cables. **ZIP**Link Pigtail Cables are prewired to an I/O terminal block with color-coded pigtail with soldered-tip wires on the other end.

Using the I/O Modules to 3rd Party Devices selector tables located in this section,

- 1. Locate your PLC I/O module.
- Select a ZIPLink pigtail cable that is compatible with your 3rd party device.



Solution 3: GS Series and DuraPulse Drives Communication Cables

Need to communicate via Modbus RTU to a drive or a network of drives?

ZIPLink cables are available in a wide range of configurations for connecting to PLCs and SureServo, SureStep, Stellar soft starters and AC drives. Add a **ZIP**Link communications module to quickly and easily set up a multi-device network.

Using the Drives Communication selector tables located in this section.

- 1. Locate your drive and type of communications.
- 2. Select a **ZIP**Link cable and other associated hardware.





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Solution 4: Serial Communications Cables

ZIPLink offers communications cables for use with DirectLOGIC, CLICK, and Productivity3000 CPUs, that can also be used with other communications devices. Connections include a 6-pin RJ12 or 9-pin, 15-pin and 25-pin D-sub connectors which can be used in conjunction with the RJ12 or D-Sub Feedthrough modules.

Using the Serial Communications Cables selector table located in this section,

- 1. Locate your connector type.
- 2. Select a cable.



Solution 5: Specialty ZIPLink Modules

For additional application solutions, *ZIP*Link modules are available in a variety of configurations including stand-alone relays, 24VDC and 120VAC transorb modules, D-sub and RJ12 feedthrough modules, communication port adapter and distribution modules, and SureServo 50-pin I/O interface connection.

Using the **ZIP**Link Specialty Modules selector table located in this section,

- 1. Locate the type of application.
- 2. Select a **ZIP**Link module.



Solution 6: ZIPLink Connector Modules to 3rd Party Devices

If you need a way to connect your device to terminal blocks without all that wiring time, then our pigtail cables with color-coded soldered-tip wires are a good solution. Used in conjunction with any compatible **ZIP**Link connector modules, a pigtail cable keeps wiring clean and easy and reduces troubleshooting time.

Using the Universal Connector Modules and Pigtail Cables table located in this section,

- 1. Select module type.
- 2. Select the number of pins.
- 3. Select cable.



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DL05 / DL06 PLCs tDL5-50



PLC I/O Modules to ZIPLink Connector Modules - DL05/06

	DL05/06 PLC Input Module <i>ZIP</i> Link Selector					
PLC		<i>ZIP</i> Link				
Input Module	# of Terms	Component	Module Part No.	Cable Part No.		
<u>D0-10ND3</u>	13	Feedthrough	ZL-RTB20	71 DO CDI 42		
D0-10ND3F	13	Feedthrough		ZL-D0-CBL13		
		Feedthrough	ZL-LTB16-24-1	ZL-D0-CBL24-L ZL-D0-CBL24-1L ZL-D0-CBL24-2L		
<u>D0-16ND3</u>	24	Sensor				
F0-08NA-1	10	See Note 2				

DL05/06 PLC Combo In/Out Module ZIPLink Selector					
PLC		<i>ZIP</i> Link			
Combo Module	# of Terms	Component	Module Part No.	Cable Part No.	
D0-07CDR	10	See Note 2			
D0-08CDD1	13	Feedthrough	ZL-RTB20	ZL-D0-CBL13	

DL05/06 PLC Analog Module <i>ZIP</i> Link Selector					
PLC		<i>ZIP</i> Link			
Analog Module	# of Terms	Component	Module	Cable	
F0-04AD-1	8	See Note 2			
F0-04AD-2	8	See Note 2			
F0-08ADH-1	13				
F0-08ADH-2	13]		ZL-D0-CBL13	
F0-04DAH-1	13		ZL-RTB20		
F0-08DAH-1	13	Feedthrough	ZL-R1BZU		
F0-04DAH-2	13				
F0-08DAH-2	13				
F0-2AD2DA-2	8	See Note 2			
F0-4AD2DA-1	8				
F0-4AD2DA-2	8				
F0-04RTD	Matched Only				
<u>F0-04THM</u>	Matched Only				

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Note: ZIPLink Connector Modules and **ZIP**Link Cables specifications are in the **ZIP**Link catalog section.

	DL05/06 PLC Output Module ZIPLink Selector					
PLC		<i>ZIP</i> Link				
Output Module	# of Terms	Component	Module Part No.	Cable Part No.		
<u>D0-10TD1</u>	13	Feedthrough	ZL-RTB20	ZL-D0-CBL13		
	24	Feedthrough	ZL-RTB20	ZL-D0-CBL24 *		
<u>D0-16TD1</u>		Fuse	ZL-RFU20 ³	ZL-D0-CBL24 *		
		Relay (sinking)	ZL-RRL16-24-1	ZL-D0-CBL24 *		
<u>D0-10TD2</u>	13	Feedthrough	ZL-RTB20	ZL-D0-CBL13		
	24	Feedthrough	ZL-RTB20	ZL-D0-CBL24 *		
D0-16TD2		Fuse	ZL-RFU20 ³	ZL-D0-CBL24 *		
<u>D0-101D2</u>		Relay (sourcing)	ZL-RRL16-24-2	ZL-D0-CBL24 *		
D0-08TR	10	See Note 2				
F0-04TRS ¹	13	Feedthrough	ZL-RTB20	ZL-D0-CBL13		

DL05/06 PLC Fixed I/O <i>ZIP</i> Link Selector					
	PLC	<i>ZIP</i> Link			
PLC # of Terms		Component	Module Part No.	Cable Part No.	
DL05	18	See Note 2			
DL06	20 (Input side only)	Feedthrough	ZL-RTB20	ZL-D06X-CBL20	
	20 (Output side only)	Feedthrough	ZL-RTB20	ZL-D06Y-CBL20	

^{*} Select the cable length by replacing the * with: Blank = 0.5 m, -1 = 1.0 m, or -2 = 2.0 m

These modules are not supported by the ZIPLink wiring system.



or -2 = 2.0 m.

Caution: The F0-04TRS relay outputs are derated not to exceed 2A per point when used with the ZIPLink wiring system.

³ Note: Fuses (5 x 20 mm) are not included. See Edison Electronic Fuse section for (5 x 20 mm) fuse. S500 and GMA electronic circuit protection for fast-acting maximum protection. S506 and GMC electronic circuit protection for time-delay performance. Ideal for inductive circuits.

To ensure proper operation, do not exceed the voltage and current rating of ZIPLink module. ZL-RFU20 = 2A per circuit; ZL-RFU40 = 400mA per circuit.