

## Output Specifications

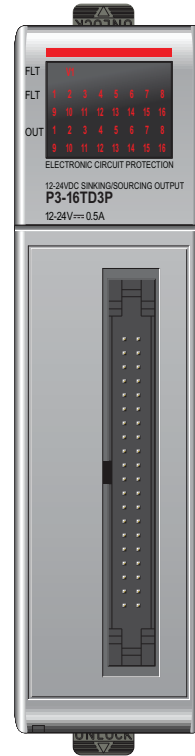
Outputs per Module	16 (sinking / sourcing)
Operating Voltage Range (Tolerance)	10.2 – 26.4 VDC
Maximum Output Current	0.5A continuous
On Voltage Drop	0.5 VDC
Maximum Inrush Current	Self-limited
OFF to ON Response	0.5 ms
ON to OFF Response	0.5 ms
Overcurrent Trip	1.2A min., 2.4A max.
Minimum Load Current to Avoid Open Load Fault Detection	113µA
Overtemperature Shutdown	Independent to each output
Load Resistance to Avoid Open Load Fault Detection	<58 kΩ
Status Indicators	Logic Side (16 points)
External 24V Error Indicator	Logic Side (1 points)
Fault Condition Indicator	Logic Side (16 points)
Connector Type	40-pin IDC
Commons per Module	4 (non-isolated)
Fuses	None
External DC Power Required	24 VDC ± 10% @ 85 mA, Class 2 (must be >= Operating voltage)*

Note: Load voltage for source configuration must be less or equal to the external power voltage wired to the module. This requirement can be met by using a single power supply to provide both module's power (24V external power) and sourcing power for loads.

## LED Status

Fault Condition	Fault Status Indication	Operation to Reset Fault
Missing External 24VDC	Second LED in row 1 is ON	Apply external 24 VDC
Open Load (Note 1)	Corresponding LEDs (row 2 and 3) are ON	Connect the load
Over Temperature or Over Load Current		Turn the output OFF or power cycle

**Note 1:** Open Load Fault is always enabled, but is only valid when output is OFF. If Open Load Fault happens while output is ON, fault will not appear until you turn OFF output.



## P3-16TD3P 16-Channel Sinking/Sourcing Protected Output

The P3-16TD3P DC Output Module provides sixteen 12-24 VDC sinking or sourcing with 4 internally connected commons for use with the Productivity3000 Programmable Automation Controller.

Module also detects the following faults:

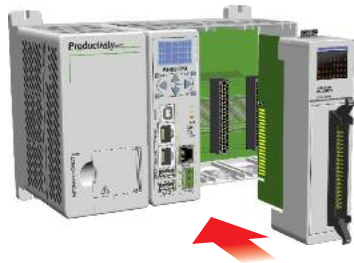
1. Missing External 24 VDC
2. Open Load
3. Over Temperature
4. Over Load Current

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Warranty: Thirty-day money-back guarantee. Two-year limited replacement. (See [www.productivitypac.com](http://www.productivitypac.com) for details).

## Module Installation Procedure

**WARNING:** Do not apply field power until the following steps are completed. See hot-swapping procedure for exceptions.



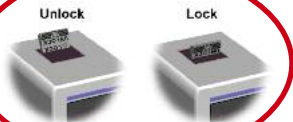
### Step One:

Align circuit card with slot and press firmly to seat module into connector.



### Step Two

Pull top and bottom locking tabs toward module face. Click indicates lock is engaged.



### Step Three

Attach field wiring using the ZIPLink wiring system.

## Wiring Options

ZIPLink Connection System  
Cable + ZIPLink Module = Complete System

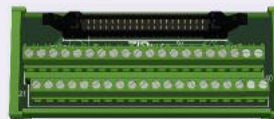


ZIPLink pre-wired cables

0.5m (1.6FT) cable  
1.0m (3.3FT) cable  
2.0m (6.6FT) cable

**ZIPLINK**  
AUTOMATIONDIRECT

ZL-CBL40  
ZL-CBL40-1  
ZL-CBL40-2



ZIPLink Modules  
Feed through

Note: P3-16TD3P is UL/CUL listed when used with ZL-RTB40.

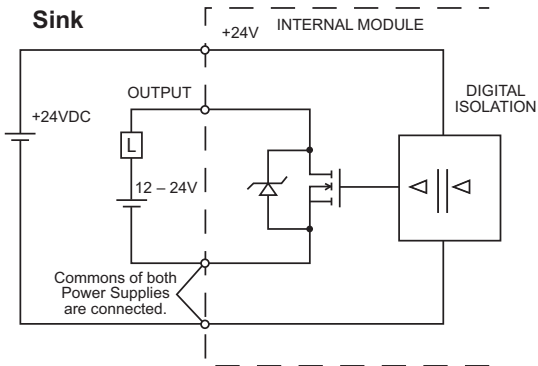
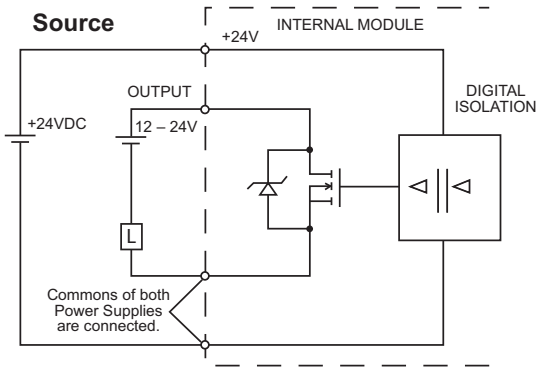
**ZIPLINK**  
AUTOMATIONDIRECT

ZL-RTB40

## Connector Specifications

Connector Type	IDC style header with latch, Omron XG4A-4034
Number of Pins	40 point
Pitch	0.1 in. (2.54 mm)

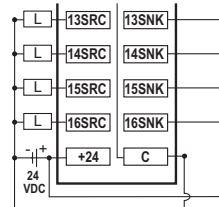
# Schematic



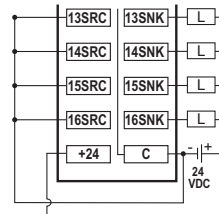
**NOTE:** If two separate power supplies are used to supply module control logic and output, commons from both power supplies must be connected.

# Wiring Diagram

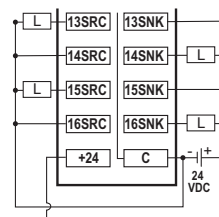
**Source Single Supply**



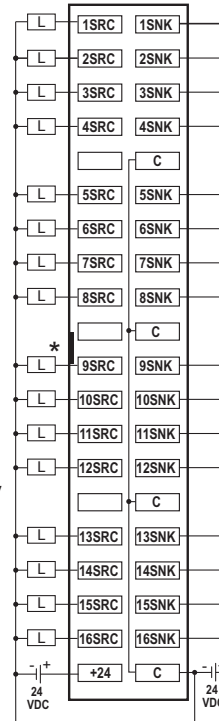
**Sink Single Supply**



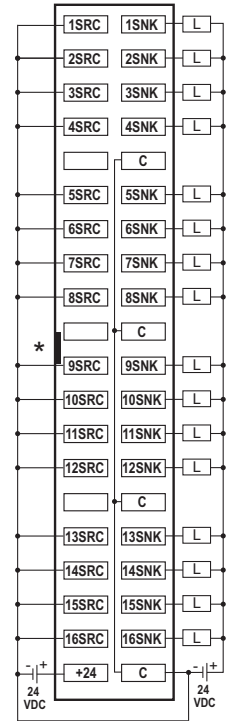
**Sink/Source Single Supply**



**Source Double Supply**



**Sink Double Supply**



\*Denotes key location of all associated ZIPLink cables.

**WARNING:** To minimize the risk of potential safety problems, you should follow all applicable local and national codes that regulate the installation and operation of your equipment. These codes vary from area to area and it is your responsibility to determine which codes should be followed, and to verify that the equipment, installation, and operation are in compliance with the latest revision of these codes.

***Equipment damage or serious injury to personnel can result from the failure to follow all applicable codes and standards. We do not guarantee the products described in this publication are suitable for your particular application, nor do we assume any responsibility for your product design, installation, or operation.***

If you have any questions concerning the installation or operation of this equipment, or if you need additional information, please call Technical Support at 770-844-4200.

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### Important Hot-Swap Information

#### The Productivity3000 PAC supports hot-swap!

Individual modules, expansion bases, and entire remote base groups can be taken offline, removed, and replaced while the rest of the PAC system continues controlling your process. Before attempting to use the hot-swap feature, be sure to read the hot-swap topic in the programming software's help file or our online documentation at AutomationDirect.com for details on how to plan your installation for use of this powerful feature.

## General Specifications

Surrounding Air Temperature	0° to 60°C (32° to 140°F),
Storage Temperature	-20° to 70°C (-4° to 158°F)
Humidity	5 to 95% (non-condensing)
Environmental Air	No corrosive gases permitted
Vibration	IEC60068-2-6 (Test Fc)
Shock	IEC60068-2-27 (Test Ea)
Field to Logic Side Isolation	1800 VAC applied for 1 second
Insulation Resistance	>10 MΩ @ 500 VDC
Heat Dissipation	5.96W
Enclosure Type	Open Equipment
Agency Approvals	UL508 file E157382, Canada & USA CE (EN61131-2*)
Module Keying to Backplane	Electronic
Module Location	Any I/O slot in any local, expansion, or remote base in a Productivity3000 System.
Field Wiring	Use ZIPLink Wiring System. See "Wiring Options" on page 2. Must use copper conductors rated 75 degrees C or equivalent.
EU Directive	See the "EU Directive" topic in the Productivity3000 Help File. Information can also be obtained at: <a href="http://www.productivitypac.com">www.productivitypac.com</a>
Weight	112.83g (3.98 oz)

\*Meets EMC and Safety requirements. See the D.O.C. for details.

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