



These network interface cards allow connecting your computer to Serial Industrial Networks.

BradCommunications™ applicom® is the easiest and trouble free solution to quickly connect your visualization application to the industrial world.

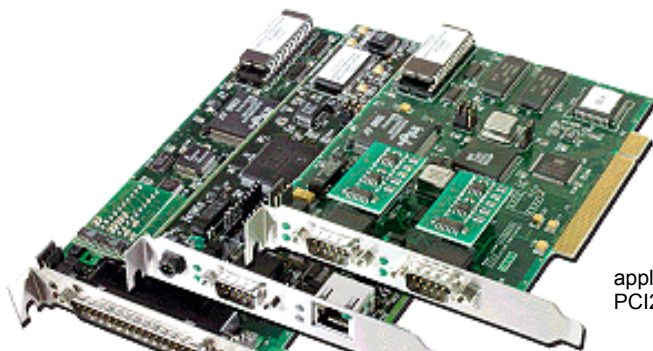
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Serial Network Interface Cards

Best choice for SCADA/HMI applications

Features

- **NEW!** PCI Express form factor
- 1, 2 or 4 Serial ports
- Large choice of Serial protocols, all included in the package.
- Certified with more than 50 SCADA/HMI packages
- On-board processor eliminates data bottle necks, ensuring delivery of time critical information
- Electrical Interfaces available:
 - ▶ RS232C
 - ▶ RS485 / RS422
 - ▶ Current Loop
 - ▶ Profibus RS485
 all with or without galvanic insulation (opto couplers)
- Speed: 50 to 38.400 Kbps
- Embedded Database (32 Kwords + 32 Kbits)
- Gateway feature with PCI4000
 - Serial ↔ Serial
 - Serial ↔ Profibus
- Complete and user-friendly package:
 - ▶ All components in the box software+hardware
 - ▶ 2 years of hardware warranty
 - ▶ Local technical support with worldwide representation
 - ▶ 1 driver / 1 configuration tool for all protocols
 - ▶ Graphical User Interface



applicom®
PCI4000 card
(RoHS)

applicom®
PCU1000 card
(RoHS + 3.3V)

applicom®
PCI2000 card



Overview

applicom® is a range of intelligent communication solutions, complete and ready to use covering more than 40 protocols among a wide choice of industrial networks and fieldbuses: Ethernet TCP/IP, Profibus, Modbus Plus, Data Highway Plus, WorldFIP and Serial Links. These solutions connect your PC-based applications (HMI, SCADA, MES, Custom applications) to industrial equipment (programmable controller, I/O modules, devices...).

Thanks to applicom® smart technology - built-in processor, each interface card is able to execute all management and the processing (polling, frame management, etc.) of communications protocols, resulting in extremely fast, efficient application performance.

The applicom® software package includes:

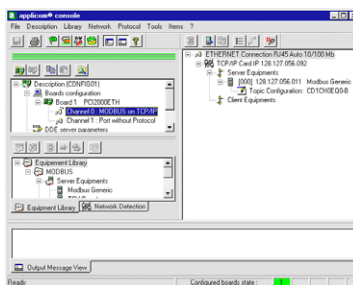
- Graphical configuration software.
- Test and network diagnostic tools.
- Data servers
 - ✓ OPC DA v1.0a, v2.05 and v3.0 (including an OPC client with its source code)
 - ✓ Wonderware I/O Server (DAServer, DDE, FastDDE, SuiteLink)
- Development libraries
 - ✓ DLL Library
 - ✓ MS Visual Studio (.NET/C#/VB/C++/C), Borland Delphi
 - ✓ National Instruments (LabWindows CVI, LabVIEW/VI)

Supported OS Standard package

- Windows 32-bit
(Vista / XP / 2003 Server)

Free Download

- Windows XP Embedded, VenturCom
RTX, VxWorks, QNX, Linux, DOS





- Configuration Software -





- OPC Server -

Technical Specifications

	applicom® PCU1000 (3.3V / 5V)	applicom® PCIE1000
	 (RJ45 port is not usable)	 (RJ45 port is not usable)
Key Benefits		
	<ul style="list-style-type: none"> • Universal PCI 3.3 V / 5V (PCI-X compatible) • RoHS compliant • On-board processor 	<ul style="list-style-type: none"> • PCI Express 1x • RoHS compliant • On-board processor
Hardware		
Unit	PCI Universal (3.3V / 5V), Short card, single slot	PCI Express 1x, v1.0a
Processor	AMD SC520 - 133 MHz	AMD SC520 - 133 MHz
Memory	16 Mbytes	16 Mbytes
Flash Memory	4 Mbytes	4 Mbytes
Interruption	Hardware Plug&Play	Hardware Plug&Play
DPRAM Address	Hardware Plug&Play (32 Kbytes)	Hardware Plug&Play (32 Kbytes)
Discrete Input	Opto-coupled discrete input, Voltage -> +10 to +30 DC or 24 V AC (50-60 Hz)	Opto-coupled discrete input, Voltage -> DC +10 to +30 or AC 24 V (50 to 60 Hz)
Discrete Output	« Watchdog » output contact free from potential, (floating) (24V DC, 0.25A)	« Watchdog » output contact free from potential, (floating) (24V DC, 0.25A)
Dimensions (LxW)	168mm x 107mm (6.61" x 4.21")	168mm x 107mm (6.61" x 4.21")
Consumption	5.5 W	5.5 W
Operating T°	0° C (32° F) ↔ +70° C (149° F)	0° C (32° F) ↔ +70° C (149° F)
Storage T°	-40° C (-40° F) ↔ +85° C (185°)	-40° C (-40° F) ↔ +85° C (185°)
EMC Compliance	Yes, Industrial and Office use	Yes, Industrial and Office use
RoHS Compliant	Yes	Yes
Communication port		
Port type	1 Asynchronous Serial port	1 Asynchronous Serial port
Connector	D-Sub, 9 pin, male	D-Sub, 9 pin, male
LED Indicators	2 leds: TX / RX	2 leds: TX / RX
Electrical Interface⁽¹⁾	RS485/422, galvanic insulation (500 V)	RS485/422, galvanic insulation (500 V)
Baud Rate:	50 bps ↔ 38400 bps	50 bps ↔ 38400 bps

(1): Also available on option: RS232 (2 or 6 wires), Current Loop 20mA by modifying the daughter card electrical interface.

Technical Specifications

	applicom® PCI2000 (5V)	applicom® PCI4000 (5V)
		
Key Benefits	<ul style="list-style-type: none"> • On-board processor • Gateway feature on 2 ports version 	<ul style="list-style-type: none"> • RoHS compliant • On-board processor • Gateway on 2 ports • Mixed up to 4 Serial or Profibus⁽²⁾ ports
Hardware		
Unit	PCI (5V), short card, single slot	PCI (5V), short card, single slot
Processor	Intel 80386EX - 24 MHz	Intel 80386EX - 24 MHz
Memory	4 Mbytes	4 Mbytes
Flash Memory	-	-
Interruption	Hardware Plug&Play	Hardware Plug&Play
DPRAM Address	Hardware Plug&Play (2 Kbytes)	Hardware Plug&Play (32 Kbytes)
Discrete Input	-	-
Discrete Output	-	-
Dimensions (LxW)	145 x 106mm (5.70" x 4.17")	175 x 107mm (6.89" x 4.21")
Consumption	4 W	4 W
Operating T°	0° C (32° F) ↔ +70° C (158° F)	0° C (32° F) ↔ +70° C (158° F)
Storage T°	-40° C (-40° F) ↔ +80° C (176°)	-40° C (-40° F) ↔ +80° C (176°)
EMC Compliance	Yes, Industrial and Office use	Yes, Industrial and Office use
RoHS Compliant	No	Yes
Communication port		
Port type	2 Asynchronous Serial ports	4 Asynchronous Serial or Profibus ⁽⁴⁾ ports
Connector	D-Sub, 9 pin, male	D-Sub, 37 pin, male (see Remote Serial Splitter Box accessories).
LED Indicators	2 leds: TX / RX	On Remote Serial Splitter Box
Electrical Interface⁽³⁾	RS485/422, galvanic insulation (500 V)	RS485/422
Baud Rate:	50 ↔ 38400 bps	50 bps ↔ 38400 Kbps

(2): Profibus ports available via Remote Serial Panels BX4010 or BX4010R.

(3): Also available on option: RS232 (2 or 6 wires), Current Loop 20mA by modifying the daughter card electrical interface.




(4): 1x500 Kbps Profibus port + 3x9600 bps Serial ports or 2x187.5 Kbps Profibus port + 2x9600 bps Serial ports



Accessories for applicom® PCI-4000 card

Remote Serial Splitter Boxes

A variety of remote serial splitter boxes are available to split the D-Sub 37 pin port of the applicom® PCI-4000 card into 4 D-Sub distinct ports. A junction cable is used to connect the card to the remote panel.

BR4000		
	Format:	Desktop version
	Port Type:	4 Serial ports, 9 pin, D-Sub male
	Dimensions (LxWxH):	185 x 110 x 30 mm (7.28 x 4.33 x 1.18")
	Junction cable:	1.5m (4.92")
	Operating T°:	0° C (32° F) ↔ +65° C (149° F)
	Storage T°:	-40° C (-40° F) ↔ +80° C (176°)
BX4010		
	Format:	Desktop version with galvanic insulation (2500V) based on opto couplers
	Port Type:	4 Serial ports, 9 pin, D-Sub male
	Dimensions (LxWxH):	275 x 175 x 67 mm (10.83 x 6.89 x 2.64")
	Junction cable:	1.5m (4.92")
	Operating T°:	0° C (32° F) ↔ +65° C (149° F)
	Storage T°:	-40° C (-40° F) ↔ +80° C (176°)
	LED Indicators:	2 leds: TX / RX
Power supply:	110V / 230V AC (internal switch)	
BX4010R		
	Format:	1U-19" rack version with galvanic insulation (2500V) based on opto couplers
	Port Type:	4 Serial ports, 9 pin, D-Sub male
	Dimensions (LxWxH):	483 x 200 x 45 mm (19.02 x 7.87 x 1.77")
	Junction cable:	1.5m (4.92")
	Operating T°:	0° C (32° F) ↔ +65° C (149° F)
	Storage T°:	-40° C (-40° F) ↔ +80° C (176°)
	LED Indicators:	2 leds: TX / RX
Power supply:	110V / 230V AC (internal switch)	

Serial Network Interface Cards



Protocols (all included with the package)

Serial	• Allen-Bradley - DF1 (PLC-5 and SLC Series)	M, C / S
	• GE Fanuc / Alstom - SNPX (90-XX and 80-XX Series)	M
	• Elsag Bailey - Data Link (5000 & 2000 Series)	M
	• Schneider Electric - Modbus RTU / ASCII	M / S
	• Moeller Group - Sucoma (PS32, PS316 Series)	M
	• Omron - Sysmac Way	M
	• Saia Burgess - S-Bus (PCD Series)	M
	• Siemens - 3964/3964R Free or RK512	M, C / S
	• Siemens - AS511 (S5 Series)	M
	• Siemens - PPI / PPI+ (S7-200 Series)	M
	• Siemens - TI-Dir (TI-505 Series)	M
	• Schneider Electric - Uni-Telway (TSX 17, 37, 57)	M / S, C / S
	Profibus	• Profibus-DP
• FDL S5 (Simatic S5 95U, 115U, 135U, 155U)		M
• Siemens - S7 / MPI (S7-300, S7-400 Series)		M
• FDL Send/Receive		C / S

M: Master, S: Slave, C: Client, S: Server

Ordering Information

Part Number	SAP	Product description
APP-SR1-PCU-C	1120205017	applicom [®] PCU1000, 1 Serial RS485/RS422 port, PCI 3.3V/5V bus (PCI-X compatible), RoHS compliant
APP-SR1-PCIE	1120205018	applicom [®] PCIE1000, 1 Serial RS485/RS422 port, PCI Express 1x, RoHS compliant
APP-SR2-PCI-C	1120200003	applicom [®] PCI2000, 2 Serial RS485/RS422 ports, PCI 5V bus, RoHS compliant
APP-SR4-PCI-C	1120200004	applicom [®] PCI4000, 4 Serial RS485/RS422 ports, PCI 5V bus, RoHS compliant
APP-INT-232-N	1120260003	RS232 electrical interface without galvanic insulation
APP-INT-232-G	1120260002	1x RS232 electrical interface with galvanic insulation
APP-INT-485-N	1120260005	2x RS485/RS422 electrical interface without galv. insulation
APP-INT-485-G	1120260004	1x RS485/RS422 electrical interface with galvanic insulation
APP-INT-CL2-N	1120260007	Current Loop 20 mA electrical interface (passive) (2 units)
APP-INT-PFB-G	1120170001	1x Profibus 485 electrical interface with galvanic insulation
APP-SBX-BRD⁽¹⁾	1120320001	BR4000 Remote Serial Splitter Box, desktop version, 4 ports
APP-SBX-BXD⁽¹⁾	1120320002	BX4010 Remote Serial Splitter Box, desktop version, 4 ports, galvanic insulation
APP-SBX-BXR⁽¹⁾	1120320007	BX4010R Remote Serial Splitter Box, 19" 1U Rack Mountable, 4 ports, galvanic insulation

(1): Accessories for applicom[®] PCI4000 cards.