

Digital Input/Output 72 Channel ISA PC272E

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Company



- **Nine 8bit programmable I/O ports**
- **All I/O signals on one standard connector on the board mounting bracket**
- **Comprehensive Windows DLL and DOS function libraries for all digital I/O operations**
- **Visual Basic and Delphi examples of interrupt servicing under Windows 95/98 & NT**
- **Compact surface mount design gives low power consumption, high reliability and excellent EMC performance**
- **CE marked board, screened cabling and termination / interfacing panels available**
- **Multiple interrupt sources with custom interrupt register**
- **Driver software for HP VEE and Windows 95/NT**

PC272E is the simplest of Amplicon's 200 Series digital I/O boards for your PC's ISA bus. All connections are made to the board via one 78 pin D connector which makes developing systems easy.

Industry standard I/O lines

The I/O lines are TTL compatible, they are available as 8 bit ports for each of the

PRICES

DESCRIPTION	PRODUCT CODE
PC272E Software configured 72 line digital I/O board, software & manual	909 562 33
78 pin connector kit well screened	919 459 53
Software and manuals now on CD ROM	

82C55 chips. Ports A and B can each be input or output, port C can be split to be 4 bits input and 4 bits output. Each chip has a control register allowing your selection to be made in software.

New termination & interfacing

See this and the next page for details. All the EX boards can be used with the PC272E. Alternatively a 78pin connector kit is available for you to make your own connection arrangements.

SPECIFICATION

Digital I/O	72 bi-directional TTL compatible, 3 x 82C55
Dimensions	92 x 155mm
Power consumption	5V @ 25mA (not loaded)
Interrupts	3, 5, 7, 9, 10, 11, 12, 15
Compliance	CE EMC

Accessories Digital Termination

EX233

EX230

EX221

EX213

- **DIN rail mounting**
- **Easy clamp terminals**
- **Compatible with 200 Series digital I/O boards**
- **Compatible with PC36AT**
- **Opto-isolated digital inputs**
- **High level logic inputs**
- **Contact closure inputs with no external power required**
- **Isolated SPDT relay outputs**
- **High level logic outputs**
- **Combinations of panels can be mixed in any system**
- **Simple TTL termination and screened cabling available**
- **I/O circuits can be used with counter timers**

This range of digital termination panels has been developed alongside the PC214E, 215E, 212E, 218E and 272E and is also pin compatible with the very popular PC36AT, our simplest and most popular digital input/output board.

All the above boards, except the PC36AT, have a 78pin D connector which gives excellent EMC screening. To simplify connection of the interface panels a distribution panel EX233 is first connected using a 78 way cable.

Simple termination with EX233

EX233 has discreet terminations for all the I/O lines on board and can therefore be used, on its own, to terminate all signals if TTL compatible levels only are to be used.

3 interface panels cover any application

To enhance some or all of the programmable inputs/outputs or counter inputs/outputs, EX213/230/221 boards can



EX233 termination and distribution panel

be plugged in to EX233 via 37 way D connectors. These connectors share the pinout of the PC36AT, hence the automatic compatibility.

These 3 new expansion panels have no restrictions on which functions can be applied to programmable I/O lines or counter timers so if you can see an application it can be done.

EX213 output panel

This panel has 24 lines all of which are output circuits.

EX230 input panel

This panel has 24 lines all of which are input circuits.

EX221 input/output panel

This panel has 24 lines 8 of which are output circuits and 16 of which are input circuits. Remember all 3 panels can be used on PC36AT too.

What each output channel provides

On a channel by channel basis you can jumper select:

Either - An isolated relay output with changeover contact. This can switch mains to 60VA and DC to 28W.

Or - Isolated High level logic output with source drivers that can drive 100mA.

The outputs are in groups of 8, each of which may be independently powered by a 24V dc supply. Alternatively they can share one 24V supply but either way external power is required. EX233 has terminals for introducing shared or commoned 24V supplies for EX213 & EX221.

There are independent terminal groups for relay and logic outputs and all outputs can be used by programmable I/O lines or counter timers.

What each input channel provides

On a channel by channel basis the following jumper selections can be made:

- An opto-isolated input with 2 ranges, 4 to 12V = LOW or 10 to 30V = HI, these are suitable for data rates <10kHz.
- High level logic input with 2 ranges, 4 to 11V = LOW or 10 to 27V = HI, these are suitable for data rates <50kHz.
- Contact closure input which uses the +5 supply on board to detect a contact closure and like all the other input modes requires no external power.

All inputs have a pair of terminals and can be used by either programmable I/O inputs or counter timers.

EMC compliance

The EX boards are all intended to DIN rail mount inside a screened enclosure, the 78 way cable which connects the EX233 to the PC214E, 215E, 212E, 218E or 272E (all of which are CE marked) is well screened and allows you to build a low emissions/susceptibility system from off the shelf component parts.

DESCRIPTION	PRODUCT CODE
EX233 termination and distribution panel & manual	909 663 33
EX213 24 channel output panel with relays & isolated logic with manual	909 663 63
EX230 24 channel input panel with isolated, common & contact closure inputs with manual	909 663 73
EX221 16 channel input & 8 channel output panel with manual	909 663 83
78 way cable 1m well screened EX233 interconnect cable	909 663 49
37 way cable interconnect cable for EX233 and EX213/230/221, PC36AT compatible	908 920 05

