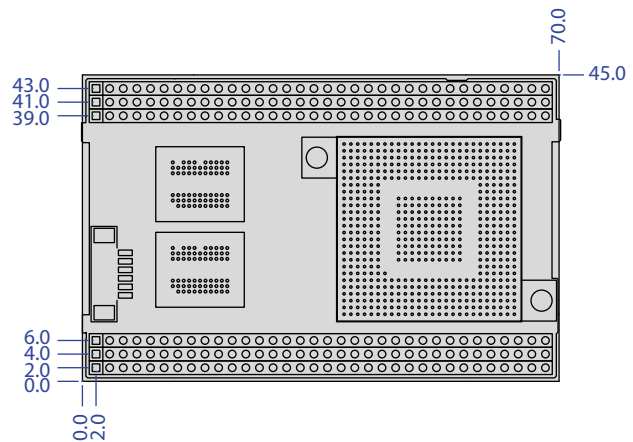


# VDX-DIP-PCI



Unit: mm

## Specifications

<b>SoC</b>	DM&P SoC CPU Vortex86DX- 800MHz Real Time Clock with Lithium Battery Backup
<b>Cache</b>	L1:16K I-Cache, 16K D-Cache L2 Cache 128KB
<b>Bus</b>	PCI interface
<b>BIOS</b>	AMI BIOS
<b>System Memory</b>	256/512MB DDR2 on board
<b>Watchdog Timer</b>	Software programmable from 30.5 $\mu$ sec.to 512 sec. x 2 sets (Watchdog 1 fully compatible with M6117D)
<b>LAN</b>	Integrated 10/100Mbps Ethernet
<b>Flash Disk Support</b>	Onboard 4MB SPI Flash Disk
<b>I/O Interface</b>	Enhanced IDE port (UltraDMA-100/66/33) x1 RS-232 port x5 (TX/RX x1) USB port x4 16-bit GPIO port x2
<b>Connectors</b>	1.25mm 6-pin wafer for JTAG x1
<b>Power Requirement</b>	Single Voltage +5V @ 340mA
<b>Weight</b>	23g
<b>Board Size</b>	70 x 45mm (2.75 x 1.77 inches)
<b>Operating Temperature</b>	-20°C ~ +70°C -40°C ~ +85°C (Optional)

## Packing List

- VDX-DIP-PCI x1

## Ordering Information

- **VDX-DIP-PCI** Vortex86DX DIP-204pin-PCI CPU Module with 256MB DDR2
- **VDX-DIP-PCI-512** Vortex86DX DIP-204pin-PCI CPU Module with 512MB DDR2

## DIP-204pin-PCI Module

DIP-204pin-PCI Module (70 x 45mm) is designed as the kernel of your own application, which integrates the Vortex86DX CPU, onboard 256MB DDR2, BIOS and multi I/O. The I/O interface of DIP-204pin-PCI Module are 34-pin (1 x 34, pitch 2.0mm) connector x6 which including PCI bus, RS-232, Printer, IDE, LAN, USB, and GPIO.

For assisting users easily use our DIP-204pin-PCI Module, ICOP provides complete development kit of DIP-204pin-PCI Development Board for DIP-204pin-PCI Module.

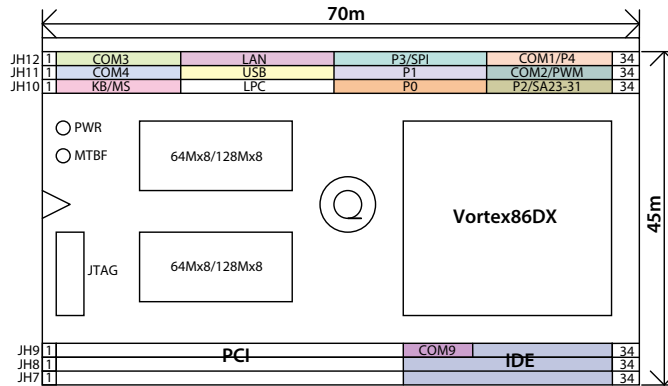
We also supply our customers with referential circuit diagram for easing user's effort during development process. Meanwhile, you can design your own based board which only equips I/O functions you need.

Please visit our website for getting further information you need:

<http://www.dmp.com.tw/tech/vortex86dx/>

You also can contact us for getting referential circuit drawing: [info@icop.com.tw](mailto:info@icop.com.tw)

### VDX-DIP-PCI



### DIP-204pin-PCI Signal Assignment

Pin	JH7	JH8	JH9	JH10	JH11	JH12
1	VCC-IN	VCC-IN	VCC3-OUT	VBATT	DCD4\	DCD3\
2	PCICLK0	PGNT-0	PREQ-0	PWRGD	RXD4\	RXD3\
3	PCICLK1	PGNT-1	PREQ-1	SPEAKER	TXD4\	TXD3\
4	PCICLK2	PGNT-2	PREQ-2	KBCLK	DTR4\	DTR3\
5	GND	GND	GND	KBDATA	DSR4\	DSR3\
6	INT-A	AD30	AD31	MSCLK	RTS4\	RTS3\
7	INT-B	AD28	AD29	MSDATA	CTS4\	CTS3\
8	INT-C	AD26	AD27	24MHZ	RI4\	RI3\
9	INT-D	AD24	AD25	LINK/ACTIVE	GND	GND
10	PCIRST-	AD22	AD23	DUPLEX	LANTX+	LANTX-
11	FRAME-	AD20	AD21	LFRAME-	LANRX+	LANRX-
12	IRDY-	AD18	AD19	LDRQ-	LUSBD0+	LUSBD0-
13	TRDY-	AD16	AD17	SERIRQ	LUSBD1+	LUSBD1-
14	DEVSEL-	AD14	AD15	LAD0	LUSBD2+	LUSBD2-
15	STOP-	AD12	AD13	LAD1	LUSBD3+	LUSBD3-
16	PAR	AD10	AD11	LAD2	GND	GND
17	CBE-3	AD8	AD9	GP00	GP10	SPICS
18	CBE-2	AD6	AD7	GP01	GP11	SPICLK
19	CBE-1	AD4	AD5	GP02	GP12	SPIDO
20	CBE-0	AD2	AD3	GP03	GP13	SPIDI
21	NC	AD0	AD1	GP04	GP14	GP34
22	NC	NC	NC	GP05	GP15	GP35
23	GND	GND	GND	GP06	GP16	GP36
24	IDESA0	IDESA1	TXD9\	GP07	GP17	GP37
25	IDE0	IDED8	RXD9\	LAD3	DCD2\	DCD1\
26	IDE1	IDED9	IDESA2	GP20	RXD2\	RXD1\
27	IDE2	IDED10	IDERST	GP21	TXD2\	TXD1\
28	IDE3	IDED11	IDEINT	GP22	DTR2\	DTR1\
29	IDE4	IDED12	IDEREQ	GP23	DSR2\	DSR1\
30	IDE5	IDED13	IDERDY	GP24	RTS2\	RTS1\
31	IDE6	IDED14	IDEIOW	GP25	CTS2\	CTS1\
32	IDE7	IDED15	IDEACK	GP26	RI2\	RI1\
33	IDEC S0	IDEC S1	IDECBLID	GP27	TXDEN2	TXDEN1
34	GND	GND	IDEIOR	VCC1.8-OUT	GND	GND

### DIP-204pin-PCI Signal Assignment (Optional)

Pin	JH10	JH11	JH12
1	VBATT	DCD4\	DCD3\
2	PWRGD	RXD4\	RXD3\
3	SPEAKER	TXD4\	TXD3\
4	KBCLK	DTR4\	DTR3\
5	KBDATA	DSR4\	DSR3\
6	MSCLK	RTS4\	RTS3\
7	MSDATA	CTS4\	CTS3\
8	24MHZ	RI4\	RI3\
9	LINK/ACTIVE	GND	GND
10	DUPLEX	LANTX+	LANTX-
11	LFRAME-	LANRX+	LANRX-
12	LDRQ-	LUSBD0+	LUSBD0-
13	SERIRQ	LUSBD1+	LUSBD1-
14	LAD0	LUSBD2+	LUSBD2-
15	LAD1	LUSBD3+	LUSBD3-
16	LAD2	GND	GND
17	GP00	GP10	GP30
18	GP01	GP11	GP31
19	GP02	GP12	GP32
20	GP03	GP13	GP34
21	GP04	GP14	GP34
22	GP05	GP15	GP35
23	GP06	GP16	GP36
24	GP07	GP17	GP37
25	LAD3	PWM0CLK	GP40
26	SA24	PWM2CLK	GP44
27	SA25	PWM0OUT	GP41
28	SA26	PWM2OUT	GP45
29	SA27	PWM0GATE	GP46
30	SA28	PWM1OUT	GP42
31	SA29	PWM1GATE	GP47
32	SA30	PWM1CLK	GP43
33	SA31	PWM2GATE	TXDEN1
34	VCC1.8-OUT	GND	GND

- 1 **1** Processor Module
- 2 **2** Mity/Tiny CPU Module
- 3 **3** PC/104 CPU Module
- 4 **4** Half-Size CPU Module
- 5 **5** 3.5" CPU Module
- 6 **6** Peripheral Module
- 7 **7** Display Product Series
- 8 **8** Accessories & Technical Information