I/O CARD QUICK START GUIDE

for **ISO-DA8/DA16**

Language	English
Version	V1.3
Update	Oct.2015

1 What's in your package?

- ➢ One ISO-DA8/DA16 series card
- ➢ One companion ISA CD (V2.1 or later)
- ➢ One Quick Start Guide(This document)

2 Installing Windows Driver
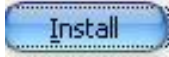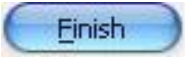
Follow these steps:

1. Set up the Windows driver. The driver is location at:
   CD:\NAPDOS\ISA\ISO-DA\
   http://ftp.icpdas.com/pub/cd/iocard/isa/napdos/isa/iso-da/

   (The Windows NT driver have support the Windows 2K and windows XP/2003/Vista 32bit version.)

   ⚠️ The Windows driver only supports Windows 98/NT/2000 and XP/2003/vista 32-bit versions.

2. Click the [Next >] button to start the installation.

3. Click the [Next >] button to install the driver into the default folder.

4. Click the [Install] button to continue the installation.

5. Select the **"NO, I will restart my computer later"** and then click the [Finish] button.

3 ••• I/O Base Address & Interrupt Setting

➢ **The base address is set from SW1 DIP switch on board:**
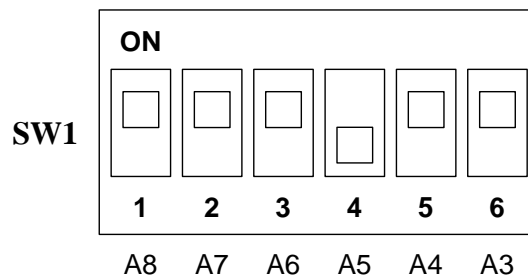
BASE ADDR	A8 1	A7 2	A6 3	A5 4	A4 5	A3 6
200-208	ON	ON	ON	ON	ON	ON
208-20F	ON	ON	ON	ON	ON	OFF
:	:	:	:	:	:	:
220-228(☑)	ON	ON	ON	OFF	ON	ON
228-22F	ON	ON	ON	OFF	ON	OFF
:	:	:	:	:	:	:
300-308	OFF	ON	ON	ON	ON	ON
308-30F	OFF	ON	ON	ON	ON	OFF
:	:	:	:	:	:	:
3F0-3F8	OFF	OFF	OFF	OFF	OFF	ON
3F8-3FF	OFF	OFF	OFF	OFF	OFF	OFF

(☑) : default base address is 0x220

➢ J1 : IRQ Channel Selection.

NO Interrupt (default)	

IRQ	3	4	5	6	7	9	10	11	12	14	15	NC

Interrupt 15	

IRQ	3	4	5	6	7	9	10	11	12	14	15	NC
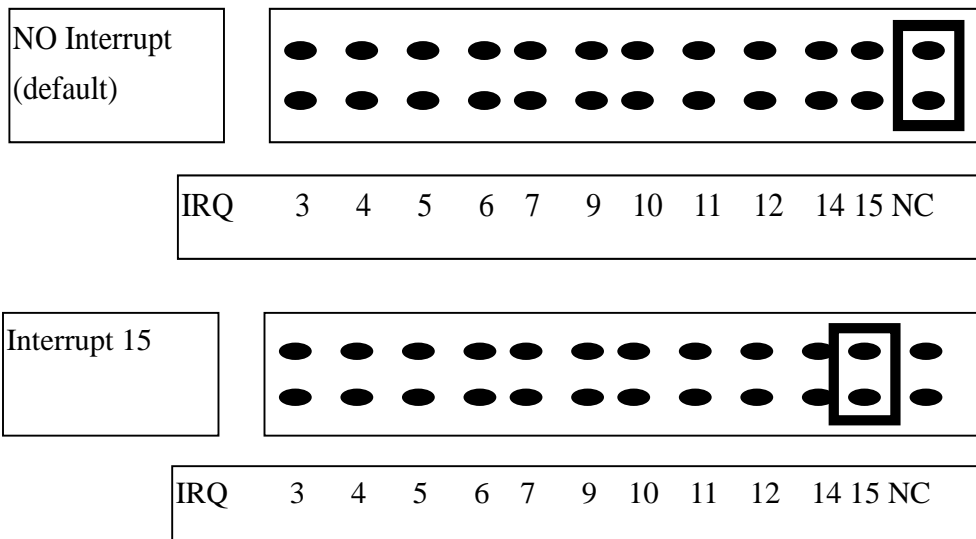
4 Installing Hardware on PC

Follow these steps:

1. Shut down and power off your computer

2. Remove the cover from the computer

3. Select an unused ISA slot

4. Carefully insert your I/O card into the ISA slot

5. Replace the PC cover

6. Power on the computer

After powering-on the computer, continue next process.

5 Pin Assignments

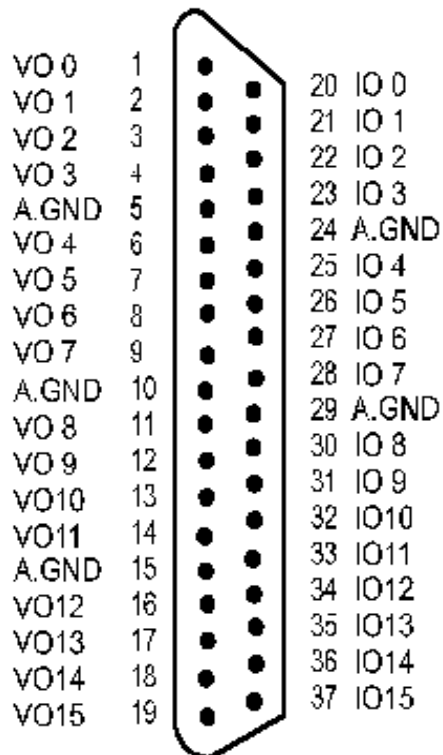> CN1 and CN2 Pin Assignments. (Digital Input/ Output)

CN1

Pin	Description	Pin	Description
1	Digital Input 0/TTL	2	Digital Input 1/TTL
3	Digital Input 2/TTL	4	Digital Input 3/TTL
5	Digital Input 4/TTL	6	Digital Input 5/TTL
7	Digital Input 6/TTL	8	Digital Input 7/TTL
9	Digital Input 8/TTL	10	Digital Input 9/TTL
11	Digital Input 10/TTL	12	Digital Input 11/TTL
13	Digital Input 12/TTL	14	Digital Input 13/TTL
15	Digital Input 14/TTL	16	Digital Input 15/TTL
17	PCB's GND output	18	PCB's GND output
19	PCB's +5 V output	20	PCB 's +12 V output

CN2

Pin	Description	Pin	Description
1	Digital Output 0/TTL	2	Digital Output 1/TTL
3	Digital Output 2/TTL	4	Digital Output 3/TTL
5	Digital Output 4/TTL	6	Digital Output 5/TTL
7	Digital Output 6/TTL	8	Digital Output 7/TTL
9	Digital Output 8/TTL	10	Digital Output 9/TTL
11	Digital Output 10/TTL	12	Digital Output 11/TTL
13	Digital Output 12/TTL	14	Digital Output 13/TTL
15	Digital Output 14/TTL	16	Digital Output 15/TTL
17	PCB's GND output	18	PCB's GND output
19	PCB's +5 V output	20	PCB's +12 V output

> CN3 Pin Assignments. (Analog Input)

CN3 Pin Assignment

	VO 0	1		20	IO 0
	VO 1	2		21	IO 1
	VO 2	3		22	IO 2
	VO 3	4		23	IO 3
	A.GND	5		24	A.GND
	VO 4	6		25	IO 4
	VO 5	7		26	IO 5
	VO 6	8		27	IO 6
	VO 7	9		28	IO 7
	A.GND	10		29	A.GND
	VO 8	11		30	IO 8
	VO 9	12		31	IO 9
	VO10	13		32	IO10
	VO11	14		33	IO11
	A.GND	15		34	IO12
	VO12	16		35	IO13
	VO13	17		36	IO14
	VO14	18		37	IO15
	VO15	19			

CN1& CN2 are TTL compatible

TTL Range

High(1)	2.4 V ~5.0 V (Voltages over 5.0 V will damage the device)
None Defined	2.4 V~0.8 V
Low(0)	Under 0.8 V

6 Self Test

1. Use the CA-2002(Optional) to connect CN1 to CN2.
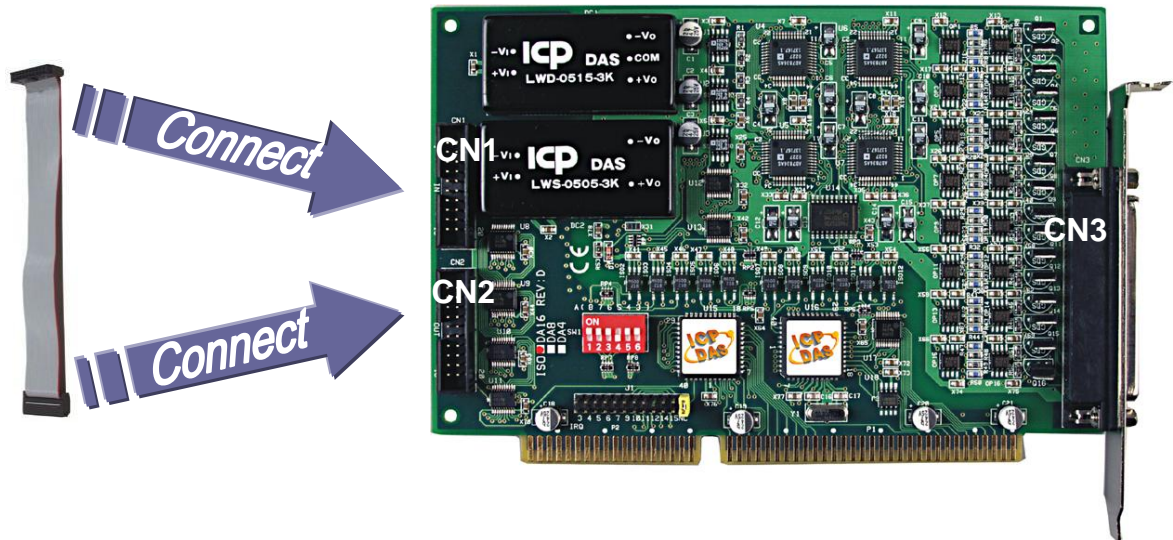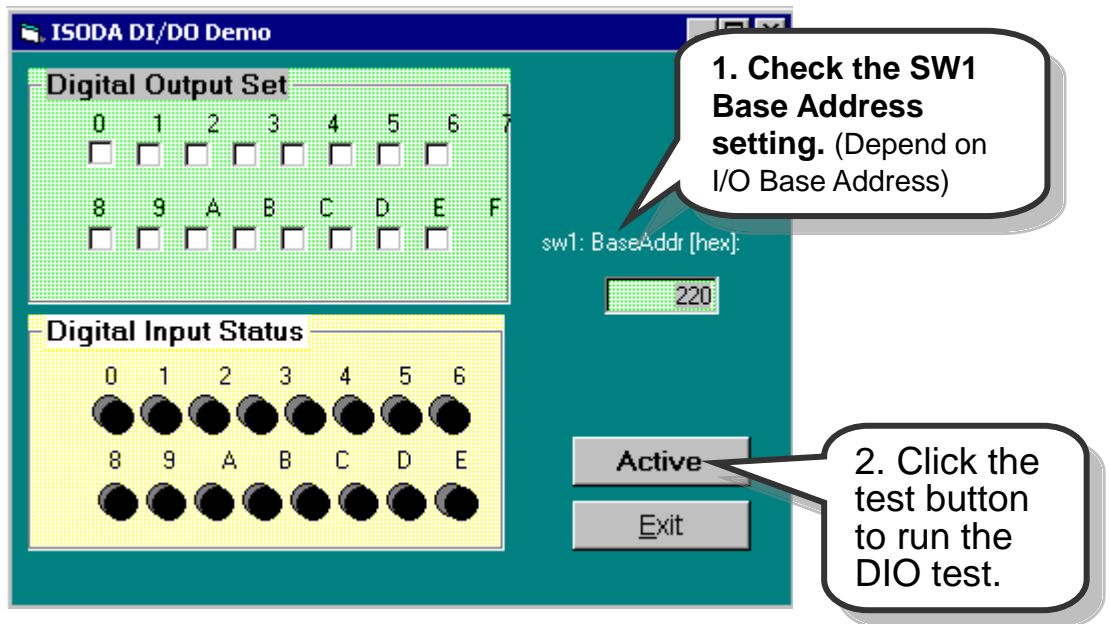

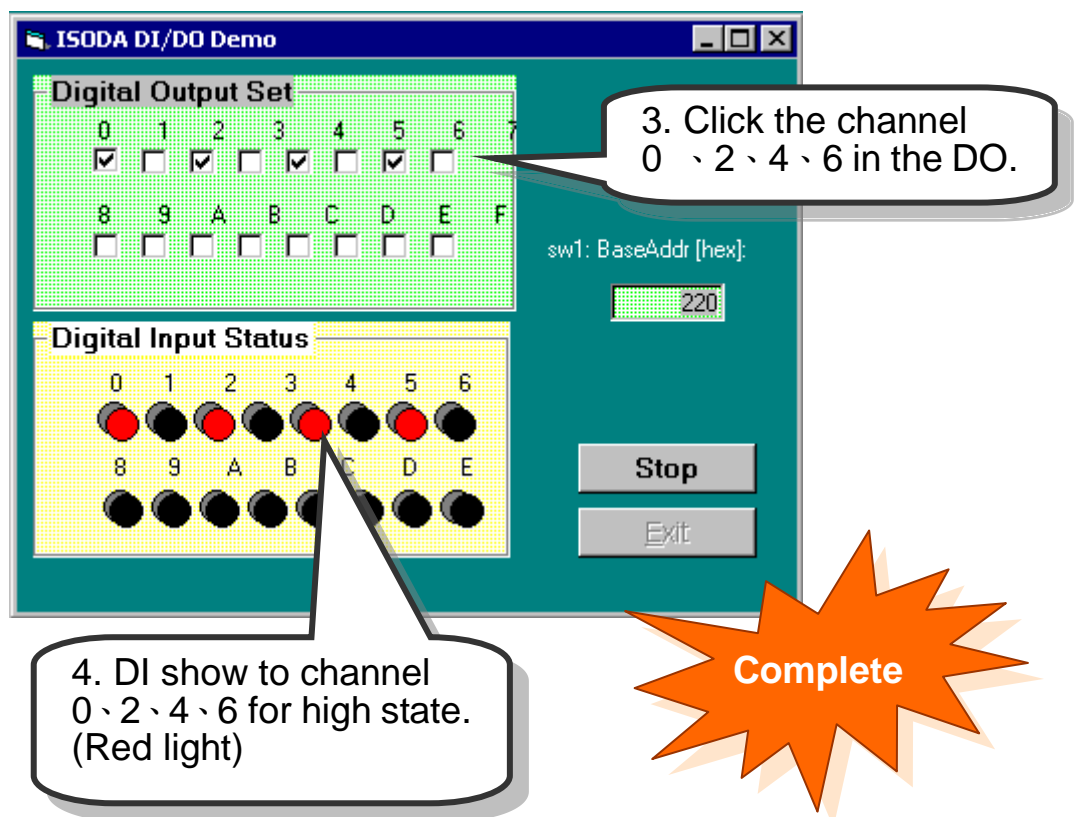2. Execute the ISO-DA8/DA16 sample program.

   The sample program is contained in a zip file which

   is located at (Default):

   C:\DAQPro\ISO_DA Win xxx\DEMO\

3. Check the I/O Base Address and test the DIO function.

ISODA DI/DO Demo

Digital Output Set
0 1 2 3 4 5 6 7
☐ ☐ ☐ ☐ ☐ ☐ ☐ ☐
8 9 A B C D E F
☐ ☐ ☐ ☐ ☐ ☐ ☐ ☐

Digital Input Status
0 1 2 3 4 5 6
● ● ● ● ● ● ● ●
8 9 A B C D E
● ● ● ● ● ● ● ●

sw1: BaseAddr [hex]:
220

Active

Exit

1. Check the SW1 Base Address setting. (Depend on I/O Base Address)

2. Click the test button to run the DIO test.

4. Get DIO function test result.

ISODA DI/DO Demo

Digital Output Set
0 1 2 3 4 5 6 7
☑ ☐ ☑ ☐ ☑ ☐ ☑ ☐
8 9 A B C D E F
☐ ☐ ☐ ☐ ☐ ☐ ☐ ☐

Digital Input Status
0 1 2 3 4 5 6
🔴 ● 🔴 ● 🔴 ● 🔴 ●
8 9 A B C D E
● ● ● ● ● ● ● ●

sw1: BaseAddr [hex]:
220

Stop

Exit

3. Click the channel 0 、2、4、6 in the DO.

4. DI show to channel 0、2、4、6 for high state. (Red light)

Complete

8 Additional Information

✓ **ISO-DA8/DA16 Series Card Product page:**

http://www.icpdas.com/products/DAQ/pc_based/iso_da8.htm
http://www.icpdas.com/products/DAQ/pc_based/iso_da16.htm

✓ **CA-2002(Optional) page:**

http://www.icpdas.com/products/Accessories/cable/cable_selection.htm

✓ **Documentation:**

CD:\NAPDOS\ISA\ISO-DA\manual
http://ftp.icpdas.com/pub/cd/iocard/isa/napdos/isa/iso-da/manual/

✓ **Software:**

CD:\NAPDOS\ISA\ISO-DA
http://ftp.icpdas.com/pub/cd/iocard/isa/napdos/isa/iso-da/

The ICP DAS Web Site

http://www.icpdas.com

- Technical support
- Supplies and ordering information
- Methods of enhancing your device
- FAQ
- Application story

Contact Us
Service@icpdas.com