



Making Data Acquisition Easy

CAGE/NCAGE CODE: 3FNFO

DB-24PR/24

24-channel Power Relay Output Board

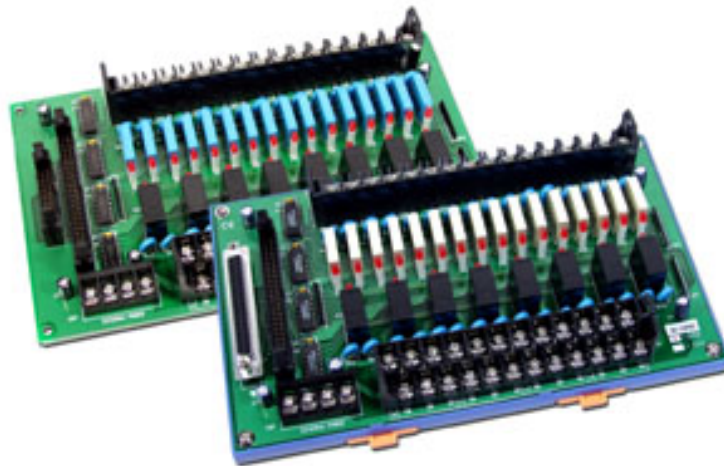
Quick Start Guide

Product Website:

https://www.icpdas-usa.com/db_24pr_24.html

1. Introduction

The DB-24PR/DB-24PRD is a 24-channel power relay output board which consists of 8 Form C and 16 Form A electromechanical relays for efficient load switching. The contact rating of each relay is 5 A at 250 VAC or 5 A at 30 VDC. These relays can be switched to ON by applying a 5 V signal from an I/O Card in the PC to the appropriate relay channels. The DB-24PR/DB-24PRD daughter board contains a single 50-pin OPTO-22 compatible connector, and a single 37-pin D-sub connector or a single 20-pin flat cable connector. The 24 onboard LEDs indicate the output status of the relays, illuminating when their associated relay is activated. To avoid overloading your PC's power supply, this board requires either a +12 VDC or a +24 VDC external power supply.

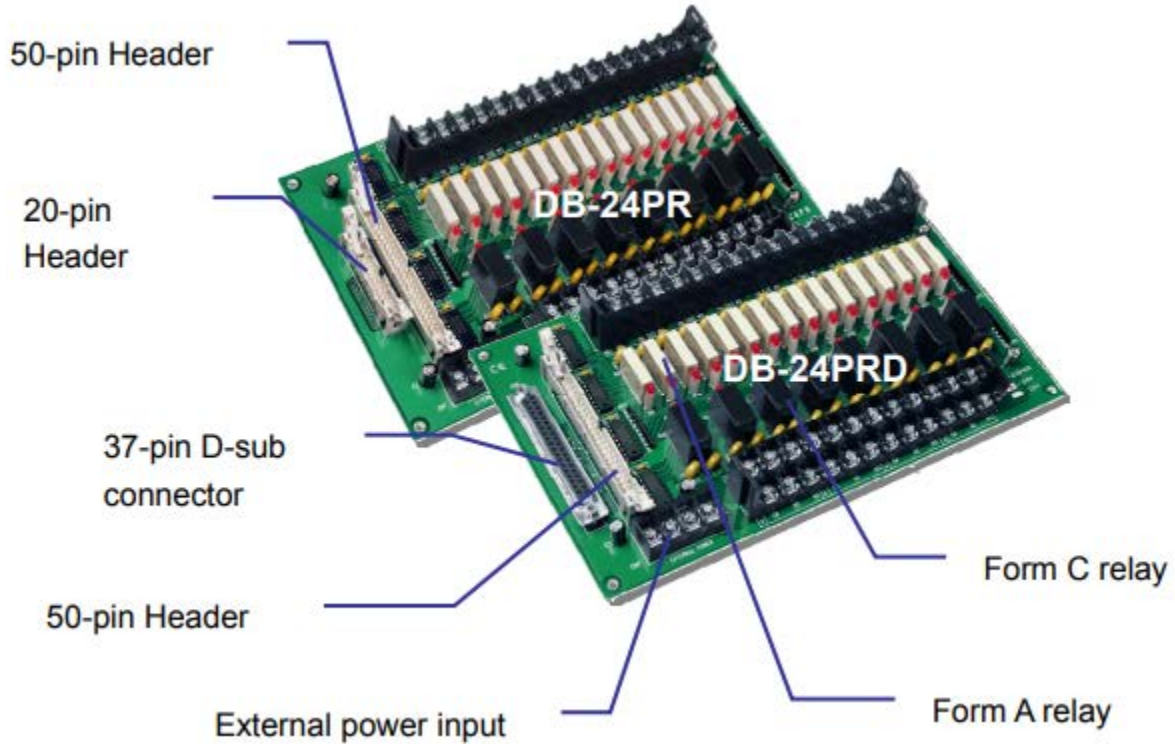




Making Data Acquisition Easy

CAGE/NCAGE CODE: 3FNFO

2. Layout



Note : DB-24PR, DB-24PRD provides external power input only.

The input power has two versions:

External Power +12 VDC input for 12 V Version

External Power +24 VDC input for 24 V version



3. Pin Assignment

CN5 : 50-pin header (DB-24PR & DB-24PRD)

GND	50	○	○	49	+5 V input
GND	48	○	○	47	CH0
GND	46	○	○	45	CH1
GND	44	○	○	43	CH2
GND	42	○	○	41	CH3
GND	40	○	○	39	CH4
GND	38	○	○	37	CH5
GND	36	○	○	35	CH6
GND	34	○	○	33	CH7
GND	32	○	○	31	CH8
GND	30	○	○	29	CH9
GND	28	○	○	27	CH10
GND	26	○	○	25	CH11
GND	24	○	○	23	CH12
GND	22	○	○	21	CH13
GND	20	○	○	19	CH14
GND	18	○	○	17	CH15
GND	16	○	○	15	CH16
GND	14	○	○	13	CH17
GND	12	○	○	11	CH18
GND	10	○	○	9	CH19
GND	8	○	○	7	CH20
GND	6	○	○	5	CH21
GND	4	○	○	3	CH22
GND	2	○	○	1	CH23

CN6: 20-pin header (DB-24PR only)

DO0	1	2	DO1
DO2	3	4	DO3
DO4	5	6	DO5
DO6	7	8	DO7
DO8	9	10	DO9
DO10	11	12	DO11
DO12	13	14	DO13
DO14	15	16	DO15
D.GND	17	18	D.GND
+5V	19	20	+12V

CN6: 37-pin D-sub connector (DB-24PRD only)

CH0	37	○	○	19	GND
CH1	36	○	○	18	N.C.
CH2	35	○	○	17	GND
CH3	34	○	○	16	N.C.
CH4	33	○	○	15	GND
CH5	32	○	○	14	N.C.
CH6	31	○	○	13	GND
CH7	30	○	○	12	N.C.
CH16	29	○	○	11	GND
CH17	28	○	○	10	CH08
CH18	27	○	○	9	CH9
CH19	26	○	○	8	CH10
CH20	25	○	○	7	CH11
CH21	24	○	○	6	CH12
CH22	23	○	○	5	CH13
CH23	22	○	○	4	CH14
GND	21	○	○	3	CH15.
+5 V	20	○	○	2	N.C.
		○	○	1	N.C.



Making Data Acquisition Easy

CAGE/NCAGE CODE: 3FNFO

CH0			CH2			CH4			CH6		
CM	NC	NO	CM	NC	NO	CM	NC	NO	CM	NC	NO

CN2 : Screw terminal

CH1			CH3			CH5			CH7		
CM	NC	NO	CM	NC	NO	CM	NC	NO	CM	NC	NO

CN3 : Screw terminal

CH23	CH21	CH19	CH17	CH15	CH13	CH11	CH9
NO	CM	NO	CM	NO	CM	NO	CM

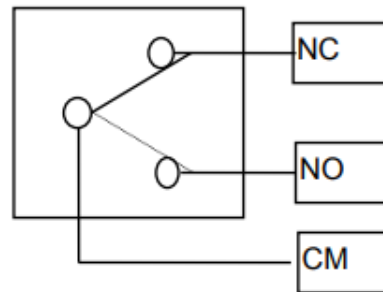
CN4 : Screw terminal

CH22	CH20	CH18	CH16	CH14	CH12	CH10	CH8
NO	CM	NO	CM	NO	CM	NO	CM

Note :

FOR Channel 0 ~ 7 Form C Relay screw terminals

CM : Common
 NC : Normal Close
 NO : Normal Open



For Channel 8 ~24 Form A Relay screw terminal

CM : Common
 NO : Normal Open

