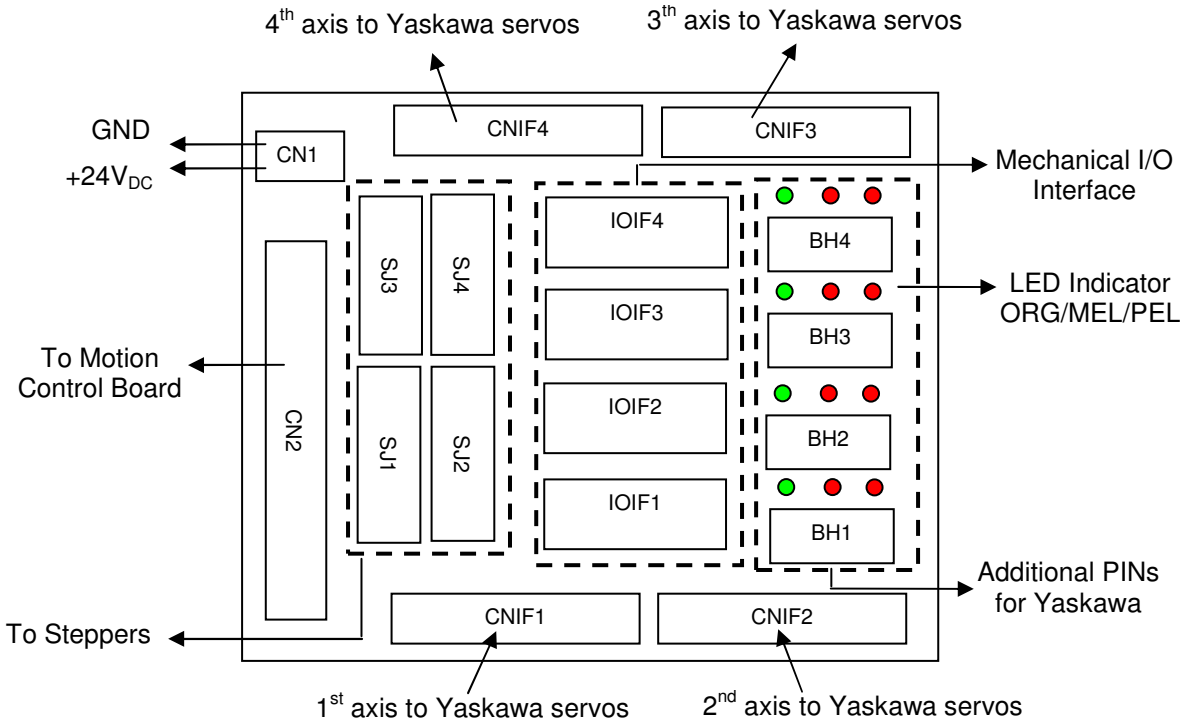
DIN-814Y User Guide

Notice

The DIN-814Y is used for wiring between **Yaskawa** series servo drivers / stepper with pulse trains input driver and **ADLINK PCI-8134, PCI-8164, PXI-8164, MPC-8164 and PCI-8158** motion controller card ONLY. Never use this terminal board with any other servo driver or cards.

P/N: 50-11134-1000 Rev.1.0



Note:

1. **Servo & Stepper:** The DIN-814Y provides 2 wiring options for each axis: CNIF# connectors are for Yaskawa series servo amplifiers, and SJ# connectors are for stepping motors. Notice that the signals in SJ# and CNIF# for corresponsing axis are directly shorted. DO NOT use both connectors at the same time.
2. **PSD Signal:** The PSD signal on the IOIF# connector has different functions depending on different motion cards. If using PCI-8134, PSD is used as a positive slow down signal. If using PCI-8164/PXI-8164/MPC-8164, PSD1/2 is for CMP1/2 of Axis0/Axis1 and PSD3/4 is for LTC3/4 of Axis3/Axis4.
3. **BH# Connector:** For additional pin definition made by Yaskawa, users can use BH# connector for wiring. The LED nearby BH# shows the indicataion of PEL, MEL and ORG.

LRI Distribuída no Brasil pela LRI | vendas@lri.com.br | 51 2129-3000

● PIN Assignments:

1. CNIF1- CNIF4 (Yaskawa Servos Interface)

No.	Name	I/O	Function	No.	Name	I/O	Function
1	IGND	--	Isolated Ground	2	IGND	--	Isolated Ground
3	PL1	I	Collector +12V Output	4	SEN	I	Reset Absolute Encoder
5	V-REF	I	Speed Command	6	IGND	--	Isolated Ground
7	OUT+	O	Pulse Signal (+)	8	OUT-	O	Pulse Signal (-)
9	T-REF	I	Torque Command	10	IGND	--	Isolated Ground
11	DIR+	O	Direction Signal (+)	12	DIR-	O	Direction Signal (-)
13	X			14	IGND	--	Isolated Ground
15	ERC	O	Dev. ctr, clr. Signal	16	X		
17	X			18	X		
19	EZ+	I	Encoder Z-phase (+)	20	EZ-	I	Encoder Z-phase (-)
21	BAT+	I	Battery (+)	22	BAT-	I	Battery (-)
23	X			24	X		
25	INP	I	In-position Signal	26	IGND	--	Isolated Ground
27	X			28	X		
29	RDY	I	Servo Ready Signal	30	IGND	--	Isolated Ground
31	ALM	I	Alarm Signal	32	IGND	--	Isolated Ground
33	EA+	I	Encoder A-phase (+)	34	EA-	I	Encoder A-phase (-)
35	EB+	I	Encoder B-phase (+)	36	EB-	I	Encoder B-phase (-)
37	AL01	O	Alarm Number1	38	AL02	O	Alarm Number2
39	AL03	O	Alarm Number3	40	SVON	O	Servo ON
41	P-CON	I	Proportion control	42	IGND	--	Isolated Ground
43	IGND	--	Isolated Ground	44	RES	I	Reset Signal
45	/P-CL	I	Forward Current	46	/N-CL	I	Reverse Current
47	+24V	O	Voltage output	48	PSO+	O	Encoder S-phase (+)
49	PSO-	O	Encoder S-phase (-)	50	X		

2. IOIF1-IOIF4 (Mechanical I/O Interface)

No.	Name	I/O	Function	No.	Name	I/O	Function
1	+24V	O	Voltage output	6	MSD	I	Negative Slow Switch(+)
2	IGND	--	Isolated Ground	7	ORG	I	Origin Signal
3	PEL	I	Positive Limit (+)	8	RES	I	Reset Signal
4	MEL	I	Positive Limit (-)	9	IGND	--	Isolated Ground
5	PSD	I	Positive Slow Switch (+)				

3. SJ1-SJ4 (Stepping Motor Control Interface)

No.	Name	I/O	Function	No.	Name	I/O	Function
1	OUT+	O	Pulse Signal (+)	6	ALM	I	Servo Alarm
2	OUT-	O	Pulse Signal (-)	7	+5V	O	Voltage output
3	DIR+	O	Direction Signal (+)	8	SVON	O	Servo ON
4	DIR-	O	Direction Signal (-)	9	+5V	O	Voltage output
5	EZ+	I	Index Signal	10	IGND	--	Isolated Ground

4. CN1 (External +24VDC Input Connector)

No.	Name	I/O	Function
1	EX+24V	I	External Power Supply Input (+24V DC ± 5%)
2	EXGND	--	External Power Supply Ground.

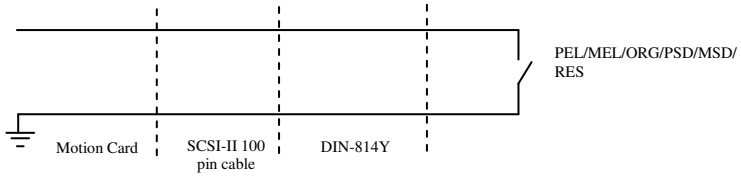
5. BH1-BH4

No.	Name	I/O	Function	No.	Name	I/O	Function
1	SEN	I	Reset Absolute Encoder	2	BAT+	I	Battery (+)
3	BAT-	I	Battery (-)	4	PSO+	O	Encoder S-phase (+)
5	PSO-	O	Encoder S-phase (-)	6	P-CON	I	Proportion control
7	V-REF	I	Speed Command	8	T-REF	I	Torque Command
9	/P-CL	I	Forward Current	10	/N-CL	I	Reverse Current
11	AL01	O	Alarm Number1	12	AL02	O	Alarm Number2
13	AL03	O	Alarm Number3	14	PL1	I	Collector +12V Output
15	+24V	O	Voltage output	16	IGND	--	Isolated Ground

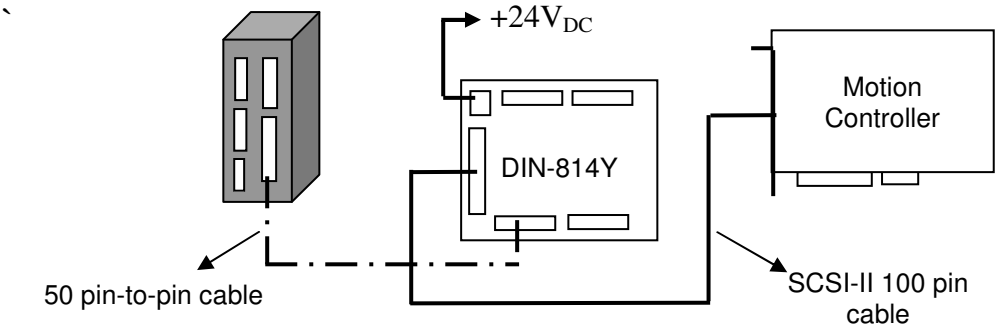
LRI Distribuída no Brasil pela LRI | vendas@lri.com.br | 51 2129-3000

● Signal Connections

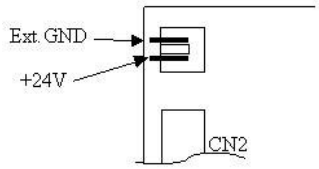
1. **PEL, MEL, ORG, PSD, MSD, RES (in IOIF#)**



2. **CMP, LTC (in IOIF#'s PSD pin only for 8164 series. Please refer to 8164 series user manual.)**



3. **CN1: This connector has the same purpse with the on-board CN1. Users can select on of them to connect.**



4. **SJ1-4: For stepping driver. Please refer to ADLINK user's manual for wiring.**
5. **BH1-4: Please refer to Yaskawa's user's manual for wiring.**

LRI Distribuída no Brasil pela LRI | vendas@lri.com.br | 51 2129-3000

- **Mechanical Dimensions:**

