

### R0E556100CFK00

REJ10J2088-0200

Rev.2.00

Converter Board for Connecting RX610 Group 144-pin 0.5mm pitch LQFP

Apr 16, 2010

### 1. Outline

The R0E556100CFK00 is a converter board for connecting the flexible cable R0E001000FLX10 to a foot pattern for 144-pin 0.5mm pitch LQFP (PLQP0144KA-A).

### 2. Package Components (See Figure 1)

Check to see if the R0E556100CFK00 package has all the following contents before using this product.

- (1) R0E556100CFK00 converter board ..... 1 pc.
- (2) YQPACK144SD (made by Tokyo Eletech Corporation) ..... 1 pc.
- (3) NQPACK144SD-ND (made by Tokyo Eletech Corporation) ..... 1 pc.
- (4) YQ-GUIDE (made by Tokyo Eletech Corporation) ..... 4 pcs.
- (5) R0E556100CFK00 User's Manual (this manual)

### 3. Specifications

Table 1 Specifications

Applicable package	PLQP0144KA-A (144-pin 0.5mm pitch LQFP)
Insertion/removal iterations of connector	50 times guaranteed

### 4. Usage (See Figure 2)

The R0E556100CFK00 can be used for debugging and on-board evaluation in common by mounting the NQPACK144SD-ND on the user system.

- (1) For debugging  
Mount the NQPACK144SD-ND on the foot pattern of the user system and attach the YQPACK144SD on it. In addition, connect the R0E556100CFK00 to the YQPACK144SD, and then connect the flexible cable R0E001000FLX10 of the emulator to the upper connector of the R0E556100CFK00.
- (2) For on-board evaluation  
Mount an MCU with on-chip flash memory or one-time PROM and the HQPACK144SD (not included) in order on the NQPACK144SD-ND on the user system.

Before using the R0E556100CFK00, be sure to read the precautions on page 3.

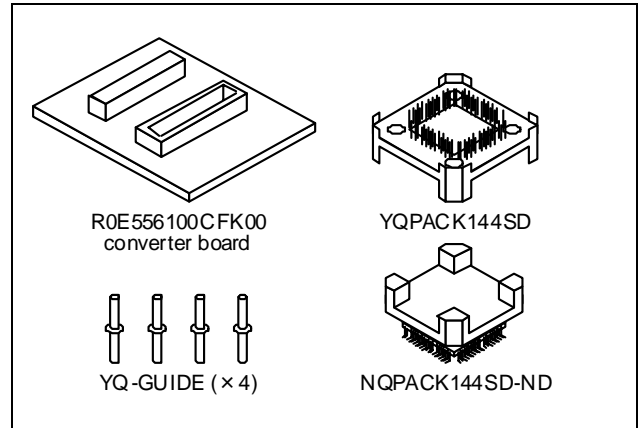


Figure 1 Package components of the R0E556100CFK00

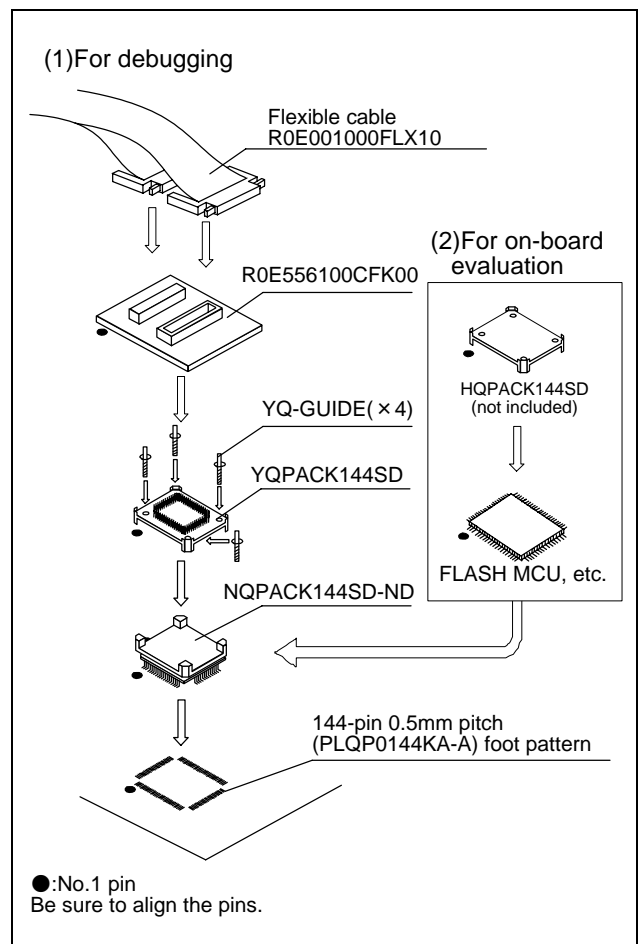


Figure 2 Usage of the R0E556100CFK00

\* NQPACK, YQPACK, YQSOCKET, YQ-GUIDE, HQPACK, TQPACK, TQSOCKET, CSSOCKET, CSPLUG/W and LSPACK are trademarks of Tokyo Eletech Corporation.

### 5. Connection Procedure (See Figure 3)

The procedure for connecting the R0E556100CFK00 is shown below.

- (1) Mount the NQPACK144SD-ND on the user system.
- (2) Attach the YQPACK144SD on the NQPACK144SD-ND.
- (3) Secure the four corners of the YQPACK144SD with the YQ-GUIDEs.

- Do NOT use the screws included with the YQPACK144SD for fixing the YQPACK144SD.
- Do NOT use the screwdriver included with the NQPACK144SD-ND for fixing the YQ-GUIDEs. That is used only for the HQPACK144SD.

- (4) Mount the R0E556100CFK00 on the YQPACK144SD.
- (5) Attach the flexible cable R0E001000FLX10 of the emulator to the R0E556100CFK00.

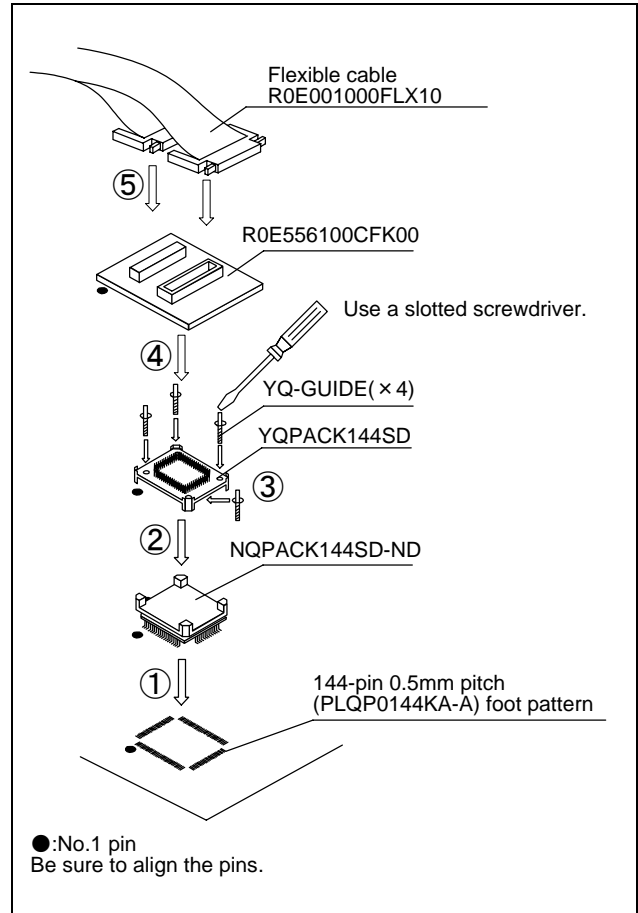


Figure 3 Connection procedure of the R0E556100CFK00

### 6. External Dimensions and a Sample Foot Pattern

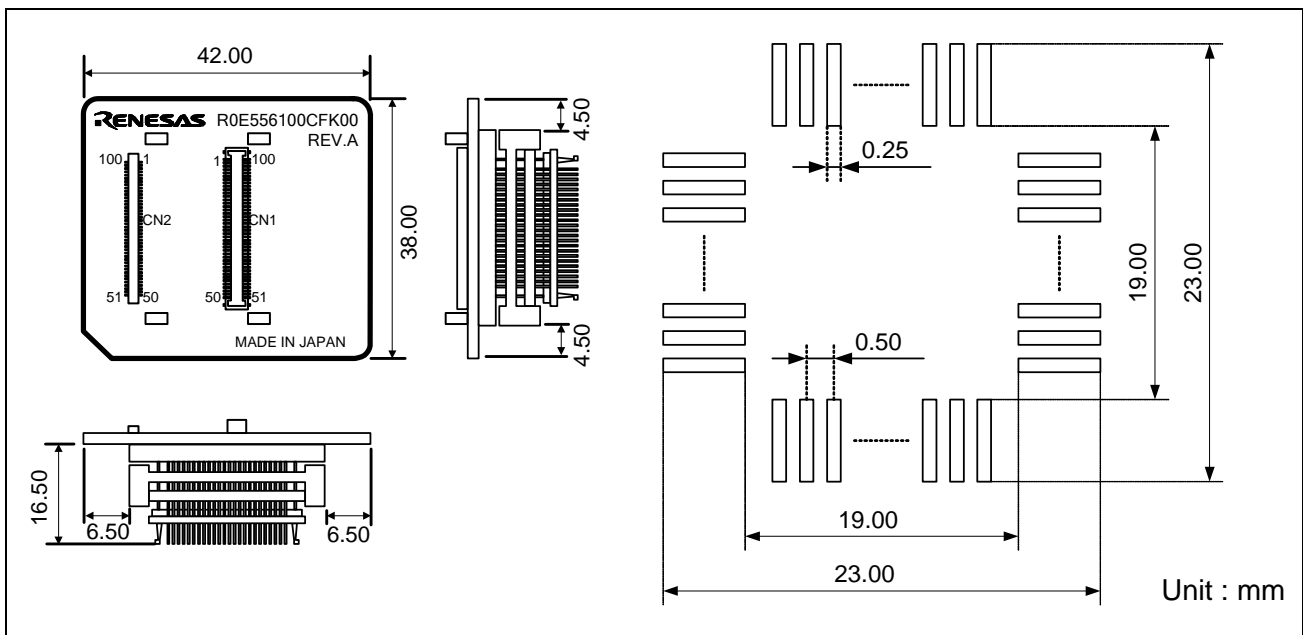


Figure 4 External dimensions and a sample foot pattern of the R0E556100CFK00

## 7. Precautions and WEEE Directive

**⚠ CAUTION**

Cautions to Be Taken for This Product:



- When connecting the YQPACK144SD, be sure to use the included YQ-GUIDEs.
- Do not use the screws included with the YQPACK144SD for connecting the YQPACK144SD.

**IMPORTANT**

Notes on This Product:

- We cannot accept any request for repair.
- For purchasing the NQPACK144SD-ND, YQPACK144SD and HQPACK144SD, contact the following:  
Tokyo Eletech Corporation [http://www.tetc.co.jp/e\\_index.htm](http://www.tetc.co.jp/e_index.htm)

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## 8. Correspondence of Connectors CN1 and CN2

Table 2 Correspondence of the connectors

CN1 Pin No.	IC1	CN1 Pin No.	IC1	CN2 Pin No.	IC1	CN2 Pin No.	IC1
1	—	100	—	1	—	100	—
2	—	99	—	2	—	99	—
3	—	98	—	3	—	98	—
4	—	97	—	4	—	97	—
5	74	96	—	5	108	96	109
6	75	95	73	6	107	95	110
7	76	94	72	7	106	94	111
8	77	93	71	8	105	93	112
9	78	92	70	9	104	92	113
10	79	91	69	10	103	91	114
11	80	90	68	11	102	90	115
12	81	89	67	12	—	89	116
13	82	88	66	13	—	88	117
14	83	87	—	14	—	87	118
15	84	86	—	15	101	86	119
16	85	85	—	16	100	85	120
17	86	84	—	17	99	84	121
18	87	83	—	18	98	83	122
19	88	82	65	19	97	82	—
20	89	81	64	20	96	81	—
21	90	80	63	21	95	80	—
22	91	79	62	22	94	79	—
23	92	78	61	23	—	78	—
24	93	77	60	24	—	77	—
25	—	76	—	25	—	76	—
26	23	75	59	26	22	75	123
27	24	74	58	27	21	74	124
28	25	73	57	28	20	73	125
29	—	72	56	29	19	72	126
30	—	71	55	30	18	71	127
31	—	70	54	31	17	70	128
32	26	69	53	32	16	69	129
33	27	68	52	33	15	68	130
34	28	67	51	34	14	67	131
35	29	66	50	35	13	66	132
36	—	65	49	36	12	65	133
37	—	64	48	37	11	64	134
38	—	63	47	38	10	63	135
39	—	62	46	39	9	62	136
40	30	61	45	40	8	61	137
41	31	60	44	41	7	60	138
42	32	59	43	42	6	59	139
43	33	58	42	43	5	58	140
44	34	57	41	44	4	57	141
45	35	56	40	45	3	56	142
46	36	55	39	46	2	55	143
47	37	54	38	47	1	54	144
48	—	53	—	48	—	53	—
49	—	52	—	49	—	52	—
50	—	51	—	50	—	51	—

(-:No connection or signals in the emulator)

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