

To our customers,

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## Old Company Name in Catalogs and Other Documents

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April 1<sup>st</sup>, 2010  
Renesas Electronics Corporation

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# M3T-FLX-100NSE

Converter Board for Connecting FLX100 to 100-pin 0.4-mm-pitch TQFP

## User's Manual

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### CAUTION

If the requirements shown in the "CAUTION" sentences are ignored, the equipment may cause personal injury or damage to the products.

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Renesas Technology

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## 1. Outline

The M3T-FLX-100NSE is a converter board for connecting the 100-core flexible cable FLX100 to a foot pattern for 100-pin 0.4-mm-pitch TQFP (100PFB-A).

## 2. Package Components (See Figure 1)

- (1) M3T-FLX-100NSE converter board ..... 1
- (2) YQPACK100SE (made by Tokyo Eletech Corporation) ..... 1
- (3) NQPACK100SE (made by Tokyo Eletech Corporation) ..... 1
- (4) YQ-GUIDE's ..... 4
- (5) M3T-FLX-100NSE User's Manual (this manual)

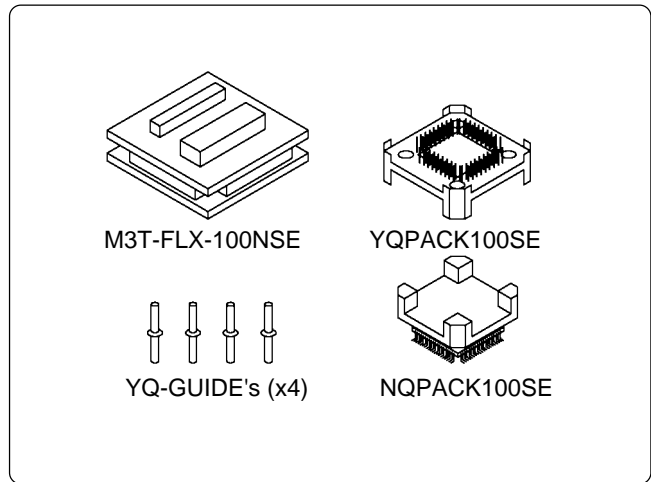


Figure 1 Package components

## 3. Specifications

Table 1 Specifications

Applicable package	100PFB-A (100-pin 0.4-mm-pitch TQFP)
Insertion/removal iterations of connector	20 times guaranteed

## 4. Usage (See Figure 2)

The M3T-FLX-100NSE can be used for debugging and onboard evaluation in common by mounting the NQPACK100SE on the target system.

### (1) For debugging

Mount the NQPACK100SE on the foot pattern of the target system and attach the YQPACK100SE on it. And connect the probe of the emulation pod to the upper connectors of the M3T-FLX-100NSE. Then connect the YQPACK100SE and the M3T-FLX-100NSE.

### (2) For onboard evaluation

Mount an MCU with on-chip flash memory or one-time PROM and the HQPACK100SE (separately available) in that order on the NQPACK100SE on the target system.

Before using the M3T-FLX-100NSE, be sure to read "7. Precautions" on page 4.

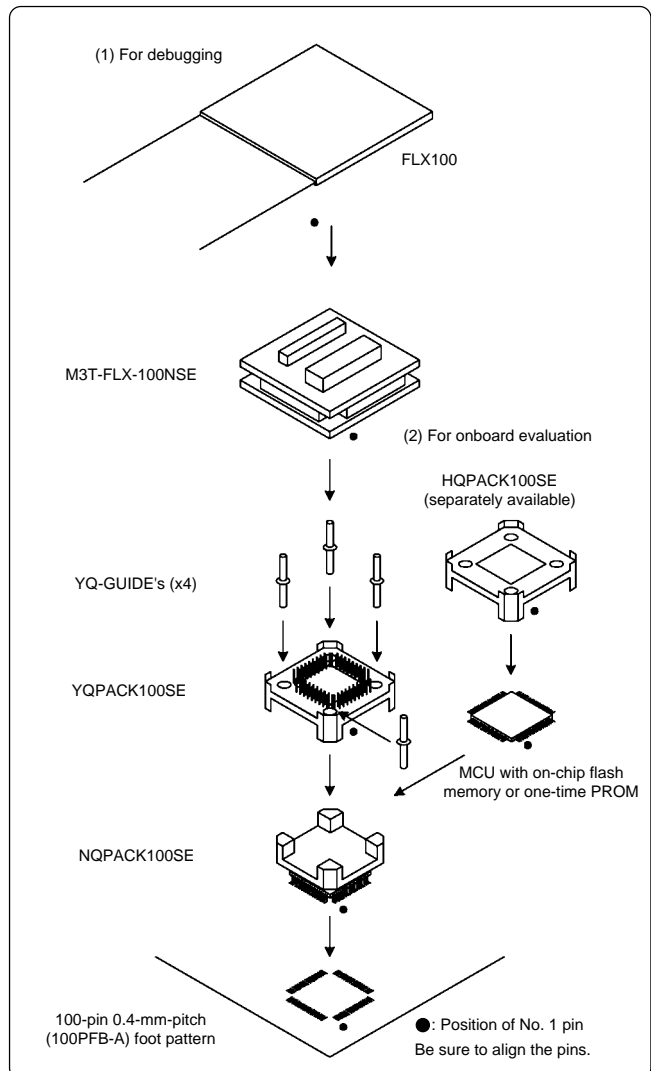


Figure 2 Usage

## 5. Connection Procedure (See Figure 3)

The procedure for connecting the M3T-FLX-100NSE is shown below.

- (1) Mount the NQPACK100SE on the target system.
- (2) Attach the YQPACK100SE on the NQPACK100SE.
- (3) Secure the four corners of the YQPACK100SE with the YQ-GUIDE's.

- Do NOT use the screws included with the YQPACK100SE.
- Do NOT use the screwdriver included with the NQPACK100SE that is used only for the HQPACK100SE. It is not for the YQ-GUIDE's.

- (4) Attach the M3T-FLX-100NSE on the YQPACK100SE.
- (5) Attach the probe of the emulation pod to the M3T-FLX-100NSE.

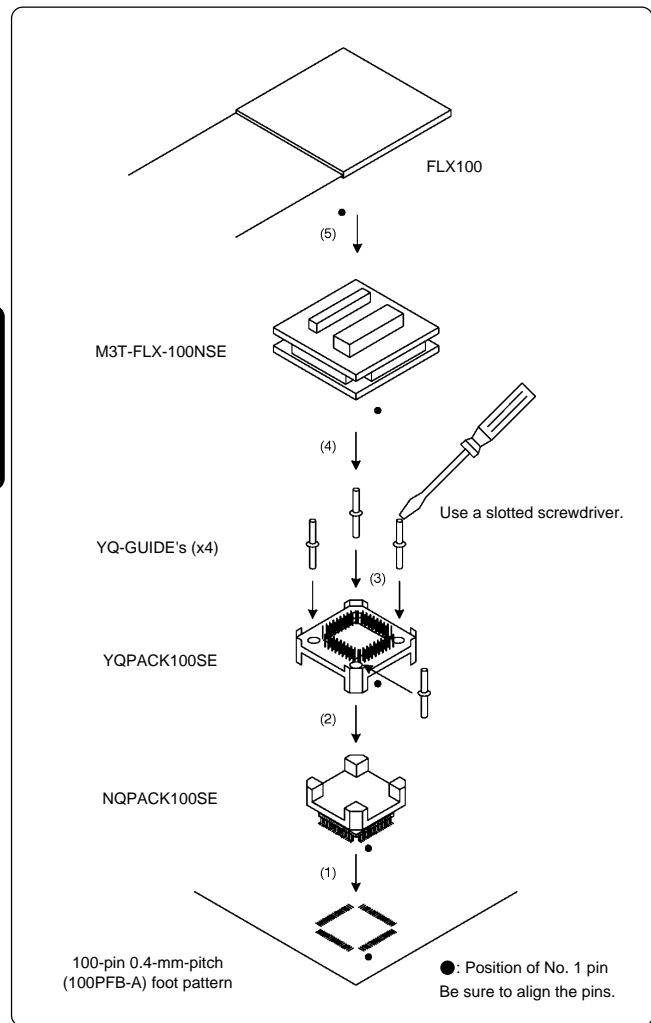


Figure 3 Connection procedure

## 6. External Dimensions and a Sample Foot Pattern

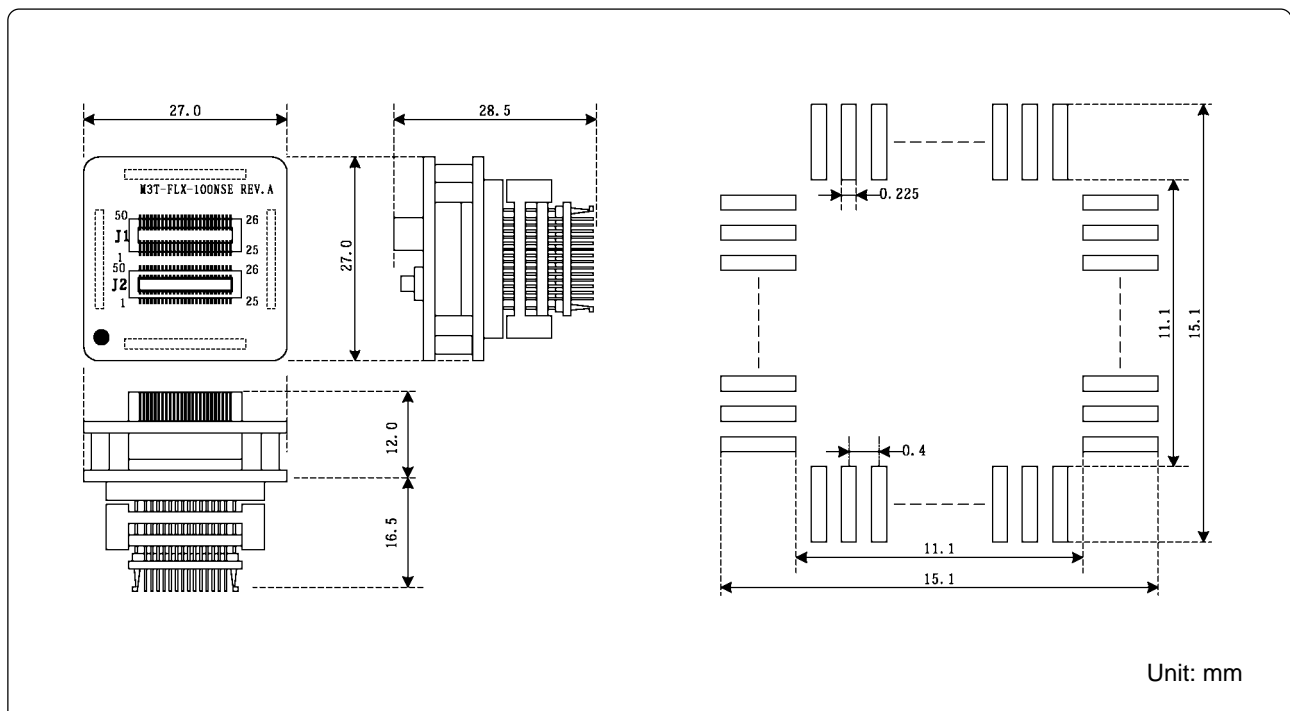


Figure 4 External dimensions and a sample foot pattern

## 7. Precautions

### CAUTION

#### Cautions to Be Taken for This Product:



- To connect the YQPACK100SE, be sure to use the included YQ-GUIDE's.
- Do NOT use the screws included with the YQPACK100SE for connecting the YQPACK100SE.

### IMPORTANT

#### Notes on This Product:

- We cannot accept any request for repair.
- For purchasing the NQPACK100SE, YQPACK100SE, HQPACK100SE, contact the following:  
Tokyo Eletech Corporation [http://www.tetc.co.jp/e\\_tet.htm](http://www.tetc.co.jp/e_tet.htm)
- For inquiries about the product or the contents of this manual, contact your local distributor.

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## 8. Correspondence of the Connectors J1 and J2

Table 2 Correspondence of the connectors

Connector pin No.	IC1	Connector pin No.	IC1	Connector pin No.	IC1	Connector pin No.	IC1
J1-1	77	J1-26	51	J2-1	1	J2-26	27
J1-2	75	J1-27	52	J2-2	3	J2-27	28
J1-3	78	J1-28	53	J2-3	4	J2-28	29
J1-4	79	J1-29	54	J2-4	5	J2-29	30
J1-5	80	J1-30	55	J2-5	6	J2-30	31
J1-6	81	J1-31	56	J2-6	7	J2-31	32
J1-7	82	J1-32	57	J2-7	8	J2-32	33
J1-8	83	J1-33	58	J2-8	9	J2-33	34
J1-9	84	J1-34	59	J2-9	10	J2-34	35
J1-10	85	J1-35	60	J2-10	11	J2-35	36
J1-11	86	J1-36	61	J2-11	12	J2-36	37
J1-12	87	J1-37	62	J2-12	13	J2-37	38
J1-13	88	J1-38	63	J2-13	14	J2-38	89
J1-14	39	J1-39	64	J2-14	15	J2-39	90
J1-15	40	J1-40	65	J2-15	16	J2-40	91
J1-16	41	J1-41	66	J2-16	17	J2-41	92
J1-17	42	J1-42	67	J2-17	18	J2-42	93
J1-18	43	J1-43	68	J2-18	19	J2-43	94
J1-19	44	J1-44	69	J2-19	20	J2-44	95
J1-20	45	J1-45	70	J2-20	21	J2-45	96
J1-21	46	J1-46	71	J2-21	22	J2-46	97
J1-22	47	J1-47	72	J2-22	23	J2-47	98
J1-23	48	J1-48	73	J2-23	24	J2-48	99
J1-24	49	J1-49	74	J2-24	25	J2-49	2
J1-25	50	J1-50	76	J2-25	26	J2-50	100