## **NEC Microcomputer Technical Information**

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		Document No.	SB	SBG-T-2421-E		
		Date issued	July 6, 2001			
	IE-780078-NS-EM1	NS-EM1 Issued by Microcomputer Engineering Dept.				
Emulation Board for			Solution Engineering Div.			
$\mu$ PD780078, 780078Y Subseries			NEC Electron Devices			
			NEC Corporation			
Usage Restriction		Notification	√ Usage restriction			
		classification		Upgrade		
Related	User's manual SUD-T-4628-1-E		Document modification			
documents				Other notification		

## 1. Affected product

IE-780078-NS-EM1 Control code: A, B, C

#### 2. Details of restriction

This notification concerns the following restriction. For details, see the attachment.

• No.3 The key return interrupt request flag (KRIF) may be set illegally.

#### 3. Workaround

The following workaround is available for this restriction. For details, see the attachment.

• No.3 There is no workaround.

#### 4. Modification schedule

Modified products are scheduled for release as follows.

Newly shipped products: From the shipment of July (control code: D)

Upgrade for already shipped products: Available from mid-July

\* Note that this schedule is subject to change without notice. For the detailed release schedule of modified products, contact an NEC sales representative.

## 5. Restriction history

Notes on using the IE-780078-NS-EM1, including the restriction history and detailed information, will be described on the following pages.

The "control code" is the second digit from the left in the 10-digit serial number in the warranty supplied with the in-circuit emulator you purchased (if it has not been upgraded). If the in-circuit emulator has been upgraded, a label indicating the new version is attached to the in-circuit emulator and the x in V-UP LEVEL x on this label indicates the control code.

# Notes on Using IE-780078-NS-EM1

## 1. Product Version

Control Code	Peripheral EVA Chip		
A, B	uPD78F0078CW (1.0)		
C, D	uPD78F0078CW (2.0)		

2. Product History

	No. Bugs and Changes/Additions to Specification		Control Code Note			
No.			В	C	D	
1	A UART0 transmission interrupt may not occur during UART transmission when this device is used with the IE-78001-R-A, even if data is written to the TXS0 register.	×	√	V	V	
2	Read values of P10 to P17 become illegal regardless of the input level when using under conditions other than AVREF = VDD0 = VDD1	×	×	V	1	
3	The key return interrupt request flag (KRIF) may be set illegally.	×	×	×	<b>V</b>	

 $\times$ : Applicable,  $\sqrt{\cdot}$ : Not applicable

## 3. Details of Bugs and Additions to Specification

No. 1 A UART0 transmission interrupt may not occur during UART transmission when this device is used with the IE-78001-R-A, if data is written to the TXS0 register.

## [Description]

A UART0 transmission interrupt may not occur during UART transmission when this device is used with the IE-78001-R-A, even if data is written to the TXS0 register.

This bug does not occur when using this device with the IE-78K0-NS(-A).

## [Workaround]

There is no workaround.

This bug has been corrected in products with control code B and later.

No. 2 Read values of P10 to P17 become illegal regardless of the input level when using under conditions other than AVREF = VDD0 = VDD1.

## [Description]

Read values of P10 to P17 become illegal regardless of the input level when using under conditions other than AVREF = VDD0 = VDD1.

## [Workaround]

There is no workaround.

This bug has been corrected in products with control code C and later.

No. 3 The key return interrupt request flag (KRIF) may be set illegally.

## [Description]

The key return interrupt request flag (KRIF) may be set illegally if a low-level signal is input when any of the PORT40 to PORT47 bits is in the input mode, and the memory expansion mode register is in the port 4 rising edge detection mode (MEM = 01h).

## [Workaround]

There is no workaround.

Use products with control code D and later.

## 4. Other Cautions

This product has the following restrictions.

No.	Restrictions		
1	The read data of address XX24 of external memory becomes invalid in external expansion		
	mode.		
	Workaround: Use control code L or later of the IE-78K0-NS or the control code E or later of the		
	IE-78K0-NS-A. Set PM4 (port 4 output mode) to 0H when using a control code earlier than L of		
	the IE-78K0-NS or a control code earlier than E of the IE-78K0-NS-A.		
2	The initial value of the interrupt request flag register IF1L (FFE2h) becomes 04h.		
	Workaround: Initialize the IF1L register to 00h after reset. (Example: MOV IF1L,#00h)		