

RENESAS TOOL NEWS on July 1, 2014: 140701/tn1

## Note on Using Code Generator for RL78 Family, 78K0R, and 78K0 MCUs Managed by CubeSuite+

When using CubeSuite+ Code\_Generator for RL78\_78K, the code generator for the RL78 Family, 78K0R, and 78K0 MCUs managed by CubeSuite+, take note of the following problems:

- With setting port 2 (target: RL78/L13 group)
- With setting an interval timer  
(targets: RL78/G10, RL78/G12, RL78/G13, RL78/G14, RL78/G1A, RL78/G1C, RL78/L12, RL78/L13, RL78/L1C, and RL78/I1A groups)

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### 1. Problem with Setting Port 2

#### 1.1 Product and Version Concerned

CubeSuite+ Code\_Generator for RL78\_78K V2.03.00

#### 1.2 MCUs Involved

RL78/L13 group of MCUs (RL78 family)

#### 1.3 Description

For port 2, even if input to or output from port pins P20 to P27, which are multiplexed with analog pin functions, is selected, the generated code will not reflect the settings of the port mode control register (PMC register).

#### 1.4 Workaround

If you are using pins of port 2 as port pins, add the correct value of the PMC register to the R\_PORT\_Create function.  
Refer to the User's Manual: Hardware for the settings of the PMC register.

#### 1.5 Schedule for Fixing the Problem

This problem will be fixed in the next version of CubeSuite+ Code\_Generator for RL78\_78K.

## 2. Problem with Setting an Interval Timer

### 2.1 Product and Version Concerned

CubeSuite+ Code\_Generator for RL78\_78K V2.03.00

### 2.2 MCUs Involved

RL78/G10, RL78/G12, RL78/G13, RL78/G14, RL78/G1A, RL78/G1C, RL78/L12, RL78/L13, RL78/L1C, and RL78/I1A groups of MCUs (RL78 family)

### 2.3 Description

On the Channel 1 and Channel 3 tabbed pages when "Timer" is selected in the tree view, selecting "Higher and lower 8 bits" under "Interval mode setting" leads to "Generates INTTM01 when counting is started" being grayed out to indicate that it has become non-selectable.

### 2.4 Workaround

To obtain the same effect as "Generates INTTM01 when counting is started" while this option is not available, modify bit 0 (see Note 2) in the TMR register setting line (see Note 1) output in void R\_TAU0\_Create(void).

Notes:

1. The TMR register setting line starts with TMRmn.  
m: Unit number (m = 0 or 1)  
n: Channel number (n = 1 or 3)
2. The meanings of the values of bit 0 are given below.  
0 : Timer interrupt is not generated when counting is started.  
1 : Timer interrupt is generated when counting is started.

An example of code to make the timer generate an interrupt when it starts counting is given below:

```
-----  
void R_TAU0_Create(void)  
{  
    .....  
    /* Channel 1 used as interval timer */  
    TMR01 = _4000_TAU_CLOCK_SELECT_CKM2 | _0000_TAU_CLOCK_MODE_CKS  
|  
    _0800_TAU_8BITS_MODE | _0000_TAU_TRIGGER_SOFTWARE |  
    _0000_TAU_MODE_INTERVAL_TIMER | 0x01;    // Added 0x01  
    .....  
}
```

### 2.5 Schedule for Fixing the Problem

This problem will be fixed in the next version of CubeSuite+  
Code\_Generator for RL78\_78K.

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