
[Upgrade to revision]
C Compiler Package for RL78 Family V1.03.00

R20TS0059EJ0100
Rev.1.00
Jul. 16, 2016

Outline

We are revising the CC-RL compiler from V1.02.00 to V1.03.00.

1. Product and Versions to Be Updated

CC-RL V1.00.00 to V1.02.00

2. Description of Revision

The following points are to be upgraded. Note that the features which are only available to users holding a registered license for the Professional edition are indicated as [Professional edition]. For details, refer to the release notes at the URLs below.

These documents will be released on July 21.

- CS+ RL78 Compiler CC-RL V1.03.00 Release Notes
<https://www.renesas.com/search/keyword-search.html#genre=document&q=r20ut3810>
- RL78 Compiler CC-RL V1.03.00 Release Notes
<https://www.renesas.com/search/keyword-search.html#genre=document&q=r20ut3815>

2.1 Improved Optimization

We have improved the performance in the generation of code.

2.2 Improvements to the Feature for Checking Source Code against MISRA-C: 2012 Rules [Professional edition]

The number of MISRA-C: 2012 rules against which source code can be checked has been doubled, from 41 to 82.

2.3 Enhancing the Security of Dynamic Memory Management [Professional edition]

A feature has been added for the detection of illicit operations in the release of heap space.

2.4 Addition of an Option

The -O pipeline option for pipeline optimization has been added.

2.5 Addition of Built-in Functions

We have added built-in functions that generate bit-manipulation instructions in the output.

2.6 Problems Fixed

The problems regarding the points below are fixed.

Renesas Tool News document number 151216/tn5

External labels defined after conditional assembly control instructions (CCRL#006)

For details of the problem, refer to the URL below.

<https://www.renesas.com/search/keyword-search.html#genre=document&q=151216tn5>

Renesas Tool News document number 160216/tn2

Designating a member of a packed structure or union in an initializing declaration (CCRL#007)

For details of the problem, refer to the URL below.

<https://www.renesas.com/search/keyword-search.html#genre=document&q=160216tn2>

Renesas Tool News document number R20TS0037EJ0100

1. Writing an instruction operand in ways which are not included in the list of instruction operations (CCRL#008)
2. Outputting code which overwrites a register for interrupt handlers (CCRL#009)

For details, refer to the URL below.

<https://www.renesas.com/search/keyword-search.html#genre=document&q=r20ts0037>

Renesas Tool News document number R20TS0058EJ0100

1. Scope of optimization (CCRL#010)

For details of the problem, refer to the URL below.

<https://www.renesas.com/search/keyword-search.html#genre=document&q=r20ts0058>

2.7 Other Modifications

- (1) Correction of debugging information

A problem with C and assembly source code not being displayed correctly during debugging has been corrected.

- (2) Correction of an internal error

A problem which led to an internal error in compilation has been corrected.

3. Updating Your Product

3.1 Online Updating

On the “Start” menu, select “Programs” and then “Renesas Electronics CS+” to start the Update Manager. This service will be available from July 21.

3.2 Downloading the Installer

Download the installer from the following URL and install the product:

http://www.renesas.com/cs+_download

The program will be available from July 21.

4. How to Purchase the New Software

To check the price or order the product, contact your local Renesas Electronics marketing office or distributor with the product name and name for ordering.

You can check the product names and names for ordering at the URL below.

http://www.renesas.com/r178_c

Revision History

Rev.	Date	Description	
		Page	Summary
1.00	Jul. 16, 2016	-	First edition issued

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