[Upgrade to revision]

C Compiler Package for RL78 V1.09.00

Outline

The C Compiler Package for RL78 Family CC-RL has been updated from V1.08.00 to V1.09.00.

V1.09.00 includes feature enhancements such as addition of the C99 standard library functions and the MISRA-C:2012 rules.

1. Products and Versions to Be Updated

CC-RL V1.00.00 to V1.08.00

2. Description of the Update

The main features of the update are described in the following sections. Features available only to licensed users of the professional edition are marked as [Professional]. For details, refer to the release note at the URL below.

(Scheduled to be released on January 20.)

CS+ RL78 Compiler CC-RL V1.09.00 Release Notes
https://www.renesas.com/search/keyword-search.html#genre=document&q=r20ut4648

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https://www.renesas.com/search/keyword-search.html#genre=document&q=r20ut4645

2.1 End of support for Windows 7

V1.09.00 or later version no longer support Windows 7 as support of Windows 7 by Microsoft ended.

2.2 C99 Standard Library Functions

The following C99 Standard library functions and macros are newly supported.。

scalbn	scalbnf	scalbnl	scalbln	scalblnf
scalblnl	nearbyint	nearbyintf	nearbyintl	rint
rintf	rintl	lrint	lrintf	lrintl
llrint	llrintf	llrintl	round	roundf
roundl	lround	lroundf	lroundl	llround
llroundf	llroundl	trunc	truncf	truncl
copysign	copysignf	copysignl	nan	nanf
nanl	fdim	fdimf	fdiml	fmax
fmaxf	fmaxl	fmin	fminf	fminl
isgreater	isgreaterequal	isless	islessequal	islessgreater
isunordered	va_copy			

2.3 Improvements to the Feature for Checking Source Code against MISRA-C:2012 rules [Professional]

Rule14.2, Rule14.3, and Rule 8.13 have been added as arguments of the -misra2012 option for checking source code against the MISRA-C:2012 rules.

2.4 Support of #pragma section Description in a Function

You can now describe #pragma section in a function.

You can specify individual sections for a static variable or string literal in a function, and initial value for an aggregate-type auto variable.

2.5 Enabling Overlapping Module Names When Creating Libraries

The -allow_duplicate_module_name option has been added.

By specifying this option, you can now allow overlapping module names to be specified when creating libraries.

2.6 Improvement of Code Generation

Code generation has been improved so that calculation that does not have to be executed in the loop is executed outside the loop.

2.7 Issues Fixed

The following issues have been fixed.

- RENESAS TOOL NEWS Document number R20TS0471EJ0100

1. Mathematical library function atan (CCRL#024)

For details about this issue, refer to the URL below.
https://www.renesas.com/search/keyword-search.html#genre=document&q= r20ts0471

- RENESAS TOOL NEWS Document number R20TS0529EJ0100

1. Using the -Oalias=ansi option (CCRL#025)

For details about this issue, refer to the URL below.
https://www.renesas.com/search/keyword-search.html#genre=document&q= r20ts0529

2.8 Other Improvements

- Improvement of the MISRA-C check message function for the standard header

Sometimes, a check message was output for the standard header when you check the code against the MISRA-C:2012 rule with the -misra2012 option specified. Improvement has been made so that such a message is not output.

- Correction of an internal error

A problem which led to an internal error in the compiler when building has been fixed.

3. Updating Your Product

3.1   Updating Online

On the Windows Start menu, select [Renesas Electronics CS+] and then start [Update Manager] to install the update. (This service will be available on January 20.)

If you are using a floating license, also download and install Software for floating license management V2.03.01 from the following URL.
https://www.renesas.com/rl78_c_download

3.2   Download the Installer from the Web

Download the installer from the URL below. (Scheduled to be released on January 20.)
https://www.renesas.com/rl78_c_download

Also, download and install License Manager V2.03.01 from the above URL.

If you are using a floating license, also download and install Software for floating license management V2.03.01 from the above URL.

4.   Purchasing the Product

For product ordering, contact your local Renesas Electronics sales office or distributor with the following information.

For product pricing, make inquiries in the same manner.

The information about product names and orderable part numbers is available at the URL below.
https://www.renesas.com/rl78_c

Revision History

Rev.	Date	Description	
		Page	**Summary**
1.00	Jan.16.20	-	First edition issued