

Quick-Start Guide

IAR Embedded Workbench® for Renesas RX62N RDK

This guide briefly describes how to get started using IAR Embedded Workbench® to run an example application on a Renesas target system (RDK).

For more detailed information, see the *IAR Embedded Workbench® IDE User Guide*, and the JLINK hardware debugger documentation, which can be found on the Help menu in the IAR Embedded Workbench IDE.

Software download and installation

- 1 Open your web browser and navigate to **http://www.renesas.com/rdkrx62ninstall**. If no Internet connection is present, go to step 3 to install from the enclosed DVD, otherwise continue with Step 2.
- 2 Download the "Installation CD for the RX62N RDK?" by clicking on the Download button then the link for "YRDKRX62N Installation CD". Following the instructions to download then start the install of the 32K Kickstart Edition of Embedded Workbench and skip to step 4.
- **3** If you cannot download the most recent installer, insert the enclosed installation DVD. The installer program starts automatically.
- **4** When the installer program has started
 - a. Make sure that "IAR Embedded Workbench 32K Kickstart for Renesas RX" is selected!
 - b. Make sure that "Segger JLink Debugger Drivers" is also selected.
 - c. Click on Next, then follow the rest of the directions to install the software.
 - d. NOTE: Multiple installers will execute and you will be required to register on the IAR web site. No issues, we know your time is valuable and the process is completely automated.

Install USB drivers for the debugger connection

Before you start IAR Embedded Workbench, USB drivers for the JLink debugger must be installed. No issues as we installed the software during the last steps!

- **5** Connect your computer to the RDK using the supplied USB cable
- 6 If this is the first time that you are using the RDK, Windows will start the driver installation wizard. If you have to locate the driver, it can be found at: C:\Program Files\SEGGER\JLinkARM_V438a\USBDriver\..
 - a. You will have to select the bits in your operating system, but that should be easy enough!.
- 7 Click **Finish** to close the wizard.

Running example applications

When you have installed and set up all the software and hardware, you can try out one of the example applications provided with the IAR Embedded Workbench. To take full advantage of the example application, you must have some working knowledge of the IAR Embedded Workbench IDE. For a quick introduction, see

the *Getting Started with IAR Embedded Workbench*®, available as an online PDF via the **IAR Information Center** shown below.

- 8 From the Start menu, start the IAR Embedded Workbench IDE by choosing All Programs>IAR Systems>IAR Embedded Workbench for Renesas RX 2.XX>IAR Embedded Workbench.
- 9 When the IAR Information Center for Renesas is displayed, click on **EXAMPLE PROJECTS**.



- 10 Click on RDKRX62N.
- 11 Open a project workspace by clicking on the icon under "Open Project".
- **12** When asked to "Choose a destination folder", you can select anywhere to place your example project. Once selected, click "Select".
- **13** Choose **Project>Make** or click the **Make** button **Content** on the toolbar and the project will compile and link.
- **14** Choose **Project>Download and Debug** or click the **Download and Debug** button *download* on the toolbar.
 - a. If asked to update the emulator firmware or the JLINK firmware, follow the prompts to complete.
- **15** Use the default settings in the hardware setup dialog box that is displayed. Click **OK twice**. This will cause your program to be downloaded to the evaluation board.

The source file including the main function is now displayed in the editor window and the application is stopped at the start.

- **16** Click **Debug>Go** or click the **Go** button **D** on the toolbar to start the application.
- **17** To stop the debugger, choose **Debug**>**Break** or click the **Break** button **b** on the debug bar.
- 18 To view or change emulator settings, choose Emulator in the menu.
- **19** To exit the debugger, choose **Debug>Stop Debugging** or click the **Stop Debugging** button **X** on the toolbar.

You can now try other example projects included; Right-Click on any other Debug project, Click on 'Set as Active" and then select Make.