

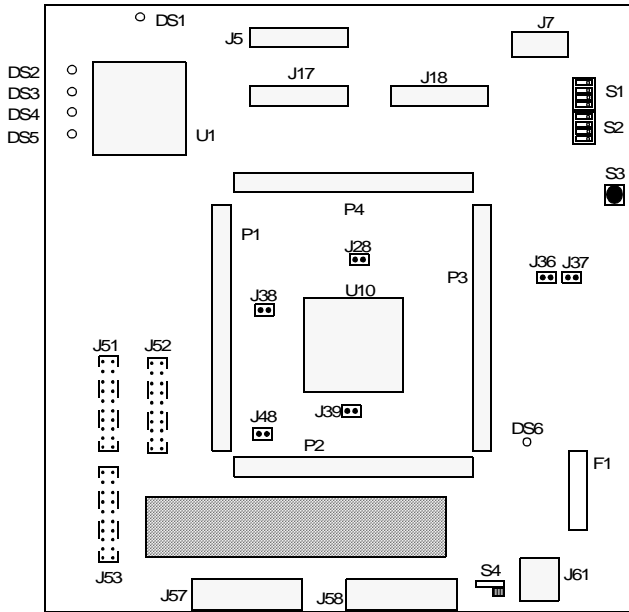


**MOTOROLA**

**m•CORE™**

## Getting Started with CodeWarrior® IDE and the MMC2107

Component Layout for the M•CORE™ MMC2107 CMB/EVB



### Install SysDS Loader and the CodeWarrior IDE

1. Insert the M•CORE MMC2107 CD-ROM into your CD-ROM drive. The installation should begin automatically.
2. An M•CORE install screen appears. Click on the MMC2107 button.
3. Click on the Install Loader button. Use the default destination directory, or choose another directory, then click on the Install button.
4. A copy-successful message appears, indicating successful installation. Click on the OK button, then click on the Exit button. You are ready to use Motorola's SysDS Loader.
5. Eject the M•CORE MMC2107 CD-ROM, and insert the CodeWarrior CD-ROM.

6. The CodeWarrior installation starts automatically. Click on the Launch CodeWarrior Setup button and follow the instructions to install the IDE. Instructions for activating the CodeWarrior license in file License\_Readme.txt. (The default path for this file is C:\Program Files\Metrowerks\CodeWarrior.)

**NOTE: If you have any problems with software installation, contact CodeWarrior IDE embedded support via email: [emb\\_support@Metrowerks.com](mailto:emb_support@Metrowerks.com).**

### Connect the CMB/EVB2107 to Your System

1. Connect the RS-232 cable between CMB/EVB2107 connector J58 and the serial port of your computer. (If appropriate for your serial port, use the DB9/DB25 adapter.)
2. Make sure that your +12-volt power supply is turned off (or disconnected from line power), and that CMB/EVB2107 power switch S4 is set to OFF. Connect the power supply cable to CMB/EVB2107 connector J61.
3. Start CMB/EVB2107 communication by selecting HyperTerminal from your computer Programs/Accessories group. (If a message asks about installing a modem, click on the No button.)
4. The Connection Description dialog box appears. Enter a name and click on the OK button.
5. The Connect To dialog box appears. Select the COM port to which you connected your serial cable, then click on the OK button.
6. The Properties dialog box appears. Set the port properties to 115200 bits per second, 8 data bits, no parity, 1 stop bit, and no flow control. Click on the OK button.
7. Set switch S2 subswitches to run MetroTRK: USR0 ON, USR1 ON, and USR2 OFF. Set other switches to their factory settings. Turn the power supply ON and set switch S4 to ON, to apply power to the board. Green LED DS6 lights to confirm power.

8. The MetroTRK welcome message appears in the Hyper Terminal window.
9. Save the HyperTerminal session for later use, if desired. Close the HyperTerminal window.

### Build and Debug Example Application

1. Insert the M•CORE MMC2107 CD-ROM in your CD-ROM drive. When the install screen appears, click on the Explore the CD button. Copy the Dev\_Sys\Mmc2107\gnusample directory to a working directory on your host computer, such as C:\Motorola\MMC2107.
2. Start the CodeWarrior IDE by using the Start→Program menu or by double clicking on IDE.exe in the CodeWarrior\bin directory.
3. Select File→New. In the pop-up window, select M•Core EABI 2107 Stationery; use “Set...” to select the location of your project file and directory; and give the project a meaningful name, such as M2107Led. Click on the Save button, then on the OK button.
4. In the New Project window pop-up click on the “+” next to CMB/EVB, click on the “+” next to TRK, click on the “+” next to Debugger Channel, then select “C.” Click on the OK button. The project file window appears, with file folders Source, MSL, and Runtime.
5. Select the pull-down menu item Project→Add Files. In the “Select files to add ...” window go to the gnusample directory and select m2107\_led.c and click on the Add button. Click on “+” next to the Source folder, and drag and drop the m2107\_led.c file to the Source folder.
6. Select main.c file in the Source folder, right click and delete main.c and click on “OK “ in the pop-up window. Select pull-down menu item Project→Add files, add the main.c file from the gnusample directory. Drag and drop the main.c file to the Source folder.
7. Press Alt-F7 to bring up the Project Settings window. Scroll down the Target Settings panels to Debugger, and select Remote Debugging. Make sure that the Use Memory Configuration File checkbox is checked. The text box below should contain filename MemCfg\_CMB2107.txt or MemCfg\_EVB2107.txt, according to your board. If not, enter the appropriate filename and click on the Save button.

8. Select the MCore Target Settings panel. If the Debugger Protocol value is not already MetroTRK, select that value and click on the Save button.
9. Select the Connection Settings panel and make sure that the Primary Serial Port Options are set to the port connected to your serial cable, 115200 bits per second, 8 data bits, no parity, 1 stop bit, and no flow control. Click on Save and close the window.
10. Select Project → Enable Debugger. Press function key F5 to build and start the debugger. In the out.elf window, press the arrow button to run the program. LEDs DS5—DS2 flash in sequence 10 times, stopping with DS2.
11. Click on the kill button to end the program and close the out.elf window. You have just set up your CMB/ EVB2107 and run a simple application. Other example projects are on the M•CORE MMC2107 CD-ROM, in the DevSys\Mmc2107\ Drivers\app subdirectories.

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