

Information Sheet

INTRODUCTION

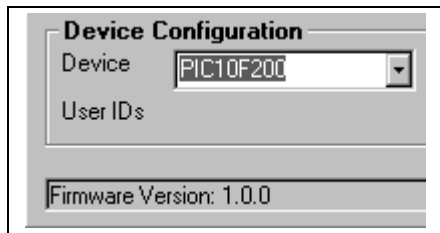
The Baseline Flash Microcontroller Programmer (BFMP) together with the PICKit™ 1 Baseline Flash Programmer PC application is designed to program baseline PIC10F2XX Flash devices.

Note: The PICKit 1 Baseline Flash Programming PC application can be downloaded from the Microchip Technology Inc. web site at www.microchip.com.

PICKit™ 1 FIRMWARE REVISION 2.0.0.

When the PICKit 1 PC application is executed with the BFMP connected to a USB port, the firmware version is displayed in the bottom left corner of the interface window, as shown in Figure 1. If "Firmware Version 2.0.0." or greater is displayed, the programmer is ready for use. If lower version number is displayed, disconnect any PICKit 1 Flash demo boards connected to USB. If the interface window states that the programmer can not be found, check all connections between the PC, any USB hubs and the BFMP.

FIGURE 1: FIRMWARE VERSION



PIC10F2XX PROGRAMMING

The 6 and 8-pin PIC10F2XX devices require an adapter socket to connect the device to the 6-pin connector at the end of the BFMP. The user can elect to purchase an adapter board from Microchip (see Universal Programming Adapter below) or build one using the information in this document.

The procedure for programming a PIC10F2XX device is as follows:

1. Load the PICKit 1 Baseline Flash Programming PC application onto a PC with a Windows® 98 SE or later Operating System.
2. Connect the BFMP to the PC using a regular USB cable.
3. Connect the BFMP to the target device through the 6-pin connector on the BFMP, using an appropriate programming adapter.
4. Start the PC application.
5. The application should correctly identify the BFMP firmware version. If not, remove any PICKit boards attached to the PC and check all USB connections, then restart the application.
6. Select the appropriate device from the Device Configuration window (see Figure 1).
7. Load the hex file using the pull-down **File** menu on the PC application toolbar.
8. Click on the **Write** device button.
9. The Progress Bar should grow from left to right until programming is complete.
10. Once programming is complete, the Status Bar should turn green.
11. If not, check all connections to the BFMP and the target device.

PIC10F2XX UNIVERSAL PROGRAMMING ADAPTER

Microchip offers a PIC10F2XX Universal Programming Adapter that provides connections to the PIC10F2XX devices for the following programmers:

- PICKit™ 1 Flash Starter Kit
- PICSTART® Plus Programmer
- MPLAB® ICB 2 In-Circuit Debugger
- BFMP Baseline Flash Microcontroller Programmer

The PIC10F2XX Universal Programmer Adapter, part number “AC163020”, can be ordered online at buy.microchip.com or by contacting the nearest Microchip Sales locations (see Worldwide Sales and Service listing page).

BUILDING A PIC10F2XX PROGRAMMING ADAPTER

Adapters are electrically single; only 5 pins are used by the programming process. The adapter only needs to connect the pins from the programmer, to the device to be programmed. No additional active or passive components are necessary. All other pins should be left unconnected. Schematic and Gerber files for sample adapters are available on the Microchip web site at www.microchip.com and on the PICKit™ 1 Flash Starter Kit CD-ROM (DS40049). The adapter may be built directly into the target circuit or as a programmer adapter similar to the Universal Programming Adapter. The information for building a PIC10F2XX adapter board is available in Table 1.

Note: BFMP Pin 1 is reserved for future expansion and should not be connected.

TABLE 1: PIC10F2XX 6-PIN SOT-23 ADAPTER PINS

Programming Pin	Description	PIC10F2XX Pin Assignment (SOT-23)	BFMP 6-Pin Programmer
VDD	Power Supply	VDD – pin 5	5
Vss	Ground	Vss – pin 2	4
ICSPCLK	Serial Clock	GP1 – pin 3	2
ICSPDAT	Serial Data	GP0 – pin 1	3
VPP	Programming Mode Select	GP3 – pin 6	6

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