Multifunctional Flash Microcomputer Programmer

Supports RENESAS M16C family, 740 family microcomputers

*Details are on the S550-MFW1U applicable device list. Please check the list on our home page before purchasing.

Faster communication
- Signal pin contact test
- Supports parallel and serial programming modes
- Supports gang programmers
- Supports stand-alone operations
- Windows 98/Me/2000/XP compatible
- Supports boot area, lock bit, and block functions
- Meets the requirements for CE marking and FCC

PC+Single Programming
Connect a PC for a single parallel programming. With this function, you can easily program programs under development or other data repeatedly to the on-board MCU before implementing it to the product. You can conduct independent operations such as erase and verify, and also program into user area, data area and boot area.

Stand-alone Single Programming
When you don’t have to make changes to the programming data, disconnect the programmer from the PC after loading data and use it in stand-alone mode. You can complete a consecutive programming with a single button operation. You will be notified of the programming status, such as finished or error, with the LEDs on the unit and buzzer.

PC+Gang Programming
Use this programmer as a gang programmer, by connecting maximum of 8 parallel adapters. It displays the programming data checksum, number of processed chips, error counts for each channel when you use it with a PC connected. Most suitable for mass-production lines.

Stand-alone Gang Programming
Of course, you can use this programmer as a gang programmer without a PC. You can check the programming complete and error complete with the LED indicator on each adapter.

Stand-alone On-board Programming
No external power supply is necessary as it uses the power supply form the target board. Most suitable for maintenance, as you can use it outdoors.

PC+On-board Programming
Connect a PC for a single parallel programming. With this function, you can easily program programs under development or other data repeatedly to the on-board MCU. You can conduct independent operations such as erase and verify, and also program into user area, data area and boot area.
Multi-function flash programmer, supporting serial programming and parallel programming [Multi Flash Writer S550-MFW1U]

[S550-MFW1U] is the Renesas Technology’s Flash Memory built-in Flash Micro-Computer Programmer. Faster communication is achieved by adopting USB interface with PC. Though its size is small, both of serial and parallel programming can be achieved. Gang programming is also available by using adapter(s). Multifunctional Flash Microcomputer Programmer also has variety of functions such as Entier-pin Contact Test.

[S550-MFW1U] Features

Faster Communication

Employing the USB Interface has increased the communication speed, two times faster than the existing model [MFW-1].

Signal Pin Contact Test

Most of the problems that occur in microcomputer programming are related to poor contact between a microcomputer and an IC socket. This flash microcomputer programmer automatically tests a contact with an IC socket before programming data to a microcomputer.

Supports parallel and serial programming

Two types in one machine. Supports both parallel I/O mode and standard serial I/O mode. In parallel I/O mode, can program to user ROM area, data ROM area and boot ROM area at the same time.

Supports both single and gang programming

Generally, gang programmers are expensive, but this flash programmer consists of a main unit and 1 parallel adapter which allows up to 8 microcomputers to be connected to the adapter, so the main unit can be freely configured for either single programming or gang programming.

Can be disconnected from the PC for standalone use

After downloading of data from a PC the programmer can be disconnected from the PC for standalone use. One-switch operation prevents programming mistakes during on-site work such as in factories.

Specifications

<table>
<thead>
<tr>
<th>Model</th>
<th>S550-MFW1U</th>
</tr>
</thead>
<tbody>
<tr>
<td>Supported MCU</td>
<td>Renesas Technology Flash Memory Internal Microcomputer M16C Family, 740 Family(^1)</td>
</tr>
<tr>
<td>Supported Flash Memory Size</td>
<td>Max. 1Mbyte</td>
</tr>
<tr>
<td>Flash memory operation mode</td>
<td>Parallel I/O mode(User ROM Area, Data ROM Area and Boot ROM Area programming is available). Standard serial I/O mode</td>
</tr>
<tr>
<td>Operation Modes</td>
<td>Remote mode, Stand-alone Mode</td>
</tr>
<tr>
<td>Target Voltage</td>
<td>3.3V, 5V</td>
</tr>
<tr>
<td>Target VPP</td>
<td>3.3V, 5V, 12V</td>
</tr>
<tr>
<td>Personal Computer I/F</td>
<td>USB1.1 supported (Max.12Mbps)(^2)</td>
</tr>
<tr>
<td>Power supply</td>
<td>DC9V(An AC adapter is not included. A separate external DC power source is required.)</td>
</tr>
<tr>
<td>Power consumption</td>
<td>Max. 200mAm</td>
</tr>
<tr>
<td>Dimensions/Weight</td>
<td>Approx. 125(w)x25(H)x100(D)mm(not including protruding parts)/Approx.350g</td>
</tr>
<tr>
<td>Main Accessories</td>
<td>DC input cable, USB connection cable, serial cable, control software, operation manual</td>
</tr>
</tbody>
</table>

\(^1\)Details are on S550-MFW1U programmable device list. Be sure to check the list on our home page before purchasing.

\(^2\)S550-MFW1U does not support clock-asynchronous serial I/O.

\(^3\)Personal computer with USB2.0 can also be used.

Supports Windows98/Me/2000/XP

PC control is used for programming data to flash microcomputers, for saving data from flash microcomputers to the PC, and for other control functions. The Graphical User Interface (GUI) makes the PC operations easy to understand. The GUI software supports Windows98/Me/2000/XP.

Optional peripheral equipment

- The products of other companies are the registered trade marks or trade marks of those respective companies.
- The information contained herein can be changed at any time without prior notice to make improvements.
- Contents of this pamphlet may be revised without notice. Please visit our website for the latest information.

Issued December 2004 FAE0412a

http://www.sunnygiken.co.jp/english/