

# General MIDI Level 2 Specification

November 1999

## Introduction

General MIDI System Level 1 made great strides in the music industry by providing a platform for compatibility between device manufacturers and content providers. Still, many manufacturers felt there needed to be additional functionality. General MIDI Level 2 is a group of extensions made to General MIDI Level 1, which increases both the number of available sounds and the amount of control available for sound editing and musical performance. All GM2 devices are also fully compatible with General MIDI Level 1.

To support these new GM2 features, the MMA & AMEI have extended the MIDI specification with numerous new messages. Portions of the MIDI Specification which have been enhanced include MIDI Tuning, Controllers, RPNs, and Universal System Exclusive Messages. Of particular significance are the new Universal System Exclusive Messages, including Controller Destination Setting, Key-Based Instrument Controllers, Global Parameter Control, and Master Fine/Coarse Tuning.

## Summary of GM2 Requirements

### GENERAL REQUIREMENTS

Number of Notes: 32 simultaneous notes

MIDI Channels: 16

- Simultaneous Melodic Instruments = up to 16 (all Channels)
- Simultaneous Percussion Kits = up to 2 (Channel 10/11)

### SUPPORTED CONTROL CHANGE MESSAGES (Some Optional)

- Bank Select (cc#0/32)
- Modulation Depth (cc#1)
- Portamento Time (cc#5)
- Channel Volume (cc#7)
- Pan (cc#10)
- Expression (cc#11)
- Hold1 (Damper) (cc#64)
- Portamento ON/OFF (cc#65)
- Sostenuato (cc#66)
- Soft (cc#67)
- Filter Resonance (Timbre/Harmonic Intensity) (cc#71)
- Release Time (cc#72)
- Attack time (cc#73)
- Brightness (cc#74)
- Decay Time (cc#75)
- Vibrato Rate (cc#76)
- Vibrato Depth (cc#77)
- Vibrato Delay (cc#78)
- Reverb Send Level (cc#91)
- Chorus Send Level (cc#93)
- Data Entry (cc#6/38)
- RPN LSB/MSB (cc#100/101)

### SUPPORTED RPNs (Registered Parameter Numbers)

- Pitch Bend Sensitivity
- Channel Fine Tune
- Channel Coarse Tune
- *New!* Modulation Depth Range (Vibrato Depth Range)
- RPN NULL

### SUPPORTED UNIVERSAL SYSTEM EXCLUSIVE MESSAGES

- Master Volume
- *New!* Master Fine Tuning
- *New!* Master Coarse Tuning
- *New!* Reverb Type
- *New!* Reverb Time
- *New!* Chorus Type
- *New!* Chorus Mod Rate
- *New!* Chorus Mod Depth
- *New!* Chorus Feedback
- *New!* Chorus Send to Reverb
- *New!* Controller Destination Setting
- *New!* Scale/Octave Tuning Adjust
- *New!* Key-Based Instrument Controllers
- *New!* GM2 System On

### GM 2 INSTRUMENT SOUND SET

### GM 2 PERCUSSION SOUND SET

For complete details on GM2 features and MIDI message syntax, please consult the General MIDI Level 2 Specification (see below to order).

## GM2 Logo

The "GM2 Logo" was created to insure consumer recognition for products that meet the General MIDI Specification. The GM2 Logo is the property of the MMA and AMEI (formerly JMISC) and must be used in accordance with guidelines established to insure the value of the GM Logo for our members and for the consumer.

If you are offering GM compatible products we encourage you to display the GM Logo and benefit from the industry investment in General MIDI. If you are not yet a member of the MMA, we would welcome the opportunity to have you join and participate in our organization.

## Document Ordering Information

The 35 page *General MIDI Level 2 Specification* document can be purchased directly from the MMA for US\$ 24.95, plus postage (listed below).

- We accept VISA, MasterCard, International Money Orders or Bank Drafts drawn and payable on US banks. We can not accept foreign currency or drafts which are not negotiable on a US bank.
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