

Mopho

Manual Addendum

The latest version of the Mopho operating system makes some additions and changes that are not documented in the manual.

Global Parameters

Pedal Mode: Norm, Arp – When set to Arp, MIDI sustain pedal on messages (CC# 64) will latch the arpeggiated notes when the arpeggiator is on. When the arpeggiator is off, sustain pedal messages have the normal, expected effect.

M Program Ch: On, Off – When on, Mopho responds to MIDI program and bank change messages. When off, Mopho ignores program and bank change messages, but continues to receive other MIDI messages.

Program Parameters

Arpeggiator Mode: see table – Several new arpeggiator modes have been added. See the table below for details.

| Arpeggiator Mode | Behavior |
|-------------------|--|
| Up | Plays from lowest to highest note. |
| Down | Plays from highest to lowest note. |
| Up Down | Plays from lowest to highest and back to lowest. |
| Assign | Plays notes in the order keys were pressed. |
| Random | Randomly plays notes. |
| 2 Octaves Up | Plays keyed notes and the same notes one octave higher, from lowest to highest. |
| 2 Octaves Down | Plays keyed notes and the same notes one octave higher, from highest to lowest. |
| 2 Octaves Up Down | Plays keyed notes and the same notes one octave higher, from lowest to highest and back to lowest. |
| 2 Octaves Assign | Plays a keyed note, then the same note one octave higher, in the order keys were pressed. |

| Arpeggiator Mode | Behavior |
|-------------------|---|
| 2 Octaves Random | Randomly plays keyed notes and the same notes one octave higher. |
| 3 Octaves Up | Plays keyed notes and the same notes one and two octaves higher, from lowest to highest. |
| 3 Octaves Down | Plays keyed notes and the same notes one and two octaves higher, from highest to lowest. |
| 3 Octaves Up Down | Plays keyed notes and the same notes one and two octaves higher, from lowest to highest and back to lowest. |
| 3 Octaves Assign | Plays a keyed note, then the same note one and two octaves higher, in the order keys were pressed. |
| 3 Octaves Random | Randomly plays keyed notes and the same notes one and two octaves higher. |

Sequence 2 Destination: Seq1 Slew

Sequence 4 Destination: Seq3 Slew – In modular analog synthesizers, a lag processor or slew limiter is used to create a time-varying change—a smooth transition—between successive, discrete control voltage levels. The rate of change is called the slew rate and one common application is to create a glide (aka portamento) effect between notes.

Among the possible destinations for Mopho sequences two and four is a sequence-only parameter called Slew. Slew behaves a little differently from the other modulation destinations, in that it is not really a destination at all; instead, it affects the sequence above it. That is, if Seq1 Slew is the chosen destination for sequence two, it controls sequence one, and Seq3 Slew in sequence four controls sequence three.

In Mopho's sequencer, Slew sets the slew rate between the previous step's value and the current step's value when the step is gated on. Confused yet? This should help: let's say sequence one is routed to oscillator frequency and sequence two to Seq1 Slew. Increasing the Slew value for step four will cause the oscillator frequency to glide from the step three value when step four is gated on. The higher the Slew value, the slower the slew rate. And

the slew rate can be different for each step. But its not just for oscillator glide. Slew can be applied to any of the destinations. For example, sequence three could be routed to filter cutoff with Slew in sequence four used to create a less abrupt transition from one step to the next.

Note: Depending upon the BPM and Clock Divide settings, the slew rate can actually exceed the time the envelopes are gated on, causing a step in the affected sequence to not reach its set value. For example, if Slew is applied to oscillator frequency, high Slew values may cause a step to sound flat or sharp. If that's not what you want, simply reduce the Slew value.

Other New Features

Tap Tempo – Hold down Assign Parameters and tap Push It to set the tempo. On the fifth tap, the tempo changes and is displayed on the LCD.

Quick Edit – When Assign Parameters is on, choose a parameter to edit with any of the four Assignable Parameters knobs, and change the value using the Program knob.

