

THE SEQUETRON

COMMAND REFERENCE

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1. INTRODUCTION

The Sequetron is controlled by commands which are entered using a series of key-presses on your MIDI keyboard. More details are in the Overview guide, but the general format is:-

- a. cmd key
- b. (optional) seq-select key(s)
- c. command key
- d. (optional) value key(s)

The keyboard must be in its default 'live' mode before the command can be started, and unless otherwise stated, will revert automatically to live mode at the end.

The **cmd** key in step (a) flips the keyboard into 'command' mode, as described in the Overview guide. This reference document describes the command and value keys used in steps (c) & (d).

2. TERMINOLOGY USED IN THIS DOCUMENT

All examples show the order of keys you need to press to enter the command, although the actual keys depend on how you map the functions on your keyboard. e.g. **cmd, seq-2, play-n, 4** means press the key mapped to the cmd function, then the key mapped to the seq-2 function, then the key mapped to the play-n function, then the key mapped to the 4 value (you don't have to release the keys; it's the order of pressing them which is important).

Global commands such as time-sig do not operate on individual seqs, so examples are shown in full, e.g.

cmd, time-sig, 3, 4

Other commands which can operate on individual seqs have examples shown in abbreviated form, e.g.

...load, 0, 5

where ... implies any of the following:-

cmd, load, 0, 5

cmd, seq-2, load, 0, 5

cmd, seq-2, seq-5, seq-6, load, 0, 5

etc.

Commands prefixed by '!' have an optional 'double-press' safety feature to prevent accidental use. The double-press time interval for each of these commands can be changed, or disabled completely, via the config file. These commands are also tagged with a '!' on the keyboard templates.

The key-mapper tools uses an abbreviated form of some commands, and these are shown here in [brackets], e.g. play-mute is [pm].

3. SEQUENCE SELECTION

You can re-select & de-select indefinitely until you either finally commit the selection by pressing a command function key (which will then act on the seqs selected at that time), or abort with the **esc** function.

The display will highlight the sequences as they are selected. The selection *may* change when the command function is finally pressed, e.g. some commands such as Pitch & Save will automatically select *all* seqs if none are selected, and the Prog command will select additional seqs which are on the same port & channel.

seq-x

Toggle selection of sequence x,

e.g.1: to play seq 3, press: **cmd, seq-3, play**

e.g.2: to play seqs 2 & 3, press: **cmd, seq-2, seq-3, play**

e.g.3: to mute seq 2, press: **cmd, seq-2, mute**

- You can press **seq-x** keys *simultaneously* or *in any order*, they are the only keys in the command process where the order is unimportant, e.g. in the 2nd example above, seq-2 & seq-3 can be pressed together or in reverse order.

allbut

Select all but the currently selected seqs, i.e. invert the current selection,

e.g. to solo seq 3, press: **cmd, seq-3, allbut, mute**

This is a also quick way of selecting all seqs if none are currently selected,

e.g. to stop all seqs, press: **cmd, allbut, stop**

desel

Deselect all seqs. This may not seem useful as you can always deselect everything by pressing **esc** (to abort the command), but it saves having to press **cmd** again to re-enter command mode. As with all functions, if you don't want it, don't map it!

4. PLAYING, MUTING & STOPPING

Sequences are either running or stopped. The term 'playing' is used to indicate seqs running in an un-muted state, as opposed to 'muted', which means running in a muted state.

Stopping vs Muting: If you *stop* a seq, it stops running, so its relative timing with other seqs will be lost, whereas if you mute a seq, it will continue to run so the relative timing is maintained.

The seq quantisation boundary depends on the synchronisation source, and whether or not any seqs are currently running or if the (optional) metronome seq is included in the selection.

play [p]

Start selected seqs playing at the next seq quantisation boundary and loop/repeat them forever. If any selected seqs are already running in a state other than 'play' (e.g. muted or cyclic play-mute), they will switch to 'play' state at the start of their next cycle. Any play/mute/toggle cyclic action is reset.

e.g.1: to play seqs 3 & 4, press: **cmd, seq-3, seq-4, play**

e.g.2: to play all seqs except seq 2, press: **cmd, seq-2, allbut, play**

mute [m]

Start selected seqs running in muted state at the next seq quantisation boundary and loop/repeat them forever. If any selected seqs are already running in a state other than 'muted' (e.g. playing or cyclic play-mute), they will switch to 'muted' state at the start of their next cycle. Any play/mute/toggle cyclic action is reset.

play-mute-tog [pmt]

Toggle selected running seqs between muted & unmuted states, taking effect at their end-of-cycle. This is a different effect to play-mute, which starts seqs running in play mode then mutes regardless of their current state. Any play/mute/toggle cyclic action is reset.

stop

Stop selected seqs at the end of their cycle.

e.g.1 to stop seqs 3 & 4, press: **cmd, seq-3, seq-4, stop**

e.g.2 to stop all seqs except seq 2, press: **cmd, seq-2, allbut, stop**

e.g.3 to stop all seqs, press: **cmd, allbut, stop**

If you want to stop a seq immediately without waiting, use the !reset command.

5. CYCLIC PLAY & MUTE

play-1, 2, 4, 8, 16, 32, r, rr, n, nn

Same as play, but play for X cycles then mute forever.

e.g. to play seq 2 for 16 cycles then mute,

press: **cmd, seq-2, play-16** or **cmd, seq-2, play-nn, 1, 6**

e.g. to play seq 1 for 6 cycles then mute,

press: **cmd, seq-1, play-n, 6** or **cmd, seq-1, play-nn, 0, 6**

e.g. to play seqs 3 & 4 for a random no. of cycles (between 1 & 9) then mute,

press: **cmd, seq-3, seq-4, play-r**

mute-1, 2, 4, 8, 16, 32, r, rr, n, nn

Same as mute, but mute for X cycles, then play forever.

play-mute-1, 2, etc, r, rr, n, rr

Same as play, but play for X cycles, mute for X cycles, then repeat.

mute-play-1, 2, etc, r, rr, n, nn

same as mute, but mute for X cycles, play for X cycles, then repeat.

play-mute-tog-1, 2, etc, r, rr, n, nn

Same as play-mute-tog but toggle between play & mute states every X cycles.

- n & nn values are specified using the digit value keys (see section Digit & Modifier values),
e.g. to play & mute alternately every 4 cycles, press: ...**play-4** or ...**play-n, 4**
r & rr variants use random values between 1 & 9, and 1 & 99 respectively.
- The no. of cycles remaining can be overridden by subsequent commands.
To cancel play/mute/toggle cyclics, use any play/mute/tog cyclic command with the no. of cycles set to 0, or use a basic play, mute or stop command.
- The total no. of variations is limited in the LE version.
- More variations can be added by request.

6. RECORDING

record

Prime selected seqs for recording (if they are stopped). The next key can be:-

either: any recordable key, in which case the recording will start and all recordable keys will be recorded on the selected seqs until one of the following 'stop/play' keys is pressed,

or: one of the following 'stop/play' keys:-

rec-esc

If the recording has already started, stop the recording, otherwise abort the command.

rec-stop

If the recording has already started, stop the recording, otherwise start recording rests on the selected seqs until a recordable key or any 'stop/play' key is pressed.

rec-play

If the recording has already started, stop the recording and immediately start the recorded seqs playing, repeating forever, otherwise start recording rests.

rec-mute

Same as rec-play, but start recorded seqs running in muted state.

rec-play-mute-1, 2, etc, 32, r, rr

Same as rec-play, but play the recorded seqs for x cycles, mute for x cycles, then repeat.

rec-mute-play-1, 2, etc, 32, r, rr

Same as rec-mute, but mute the recorded seqs for x cycles, play for x cycles, then repeat.

- The current live attributes (port, channel & velocity) are transferred to the recorded seqs as soon as the recording starts.
- The current metronome and quantise settings are used during recording.
- If the recording is aborted before starting, the original seq contents (if any) are retained.
- If a recording only contains rests, the seq contents will be deleted when the recording stops. This has the same effect as using the Delete command.

- The 'stop/play' record functions above are prefixed with '**rec-**' to show they are **not** the same as those in command mode, even though they have similar names. This means they can be mapped to different keys if reqd. You can also choose to only map a subset (like the factory settings), or map them for the aux device, freeing up more keys for recording.
- For repeated seqs, there is no audible difference between having rests at the beginning or end of the seq, so instead of trying to record rests at the start of the seq, you may find it easier to just wait for the right time within the bar before recording notes so any rests are stored at the *end* of the seq when you stop the recording. As long as you never *stop* the seq, i.e. keep it playing or muted, the loop will sound the same as if it had rests at the start.
- The total no. of variations is limited in the LE version.
- More variations can be added by request.

rec-nn

Records a specified no. of notes from the raw input ports, e.g. for pre-loading selected seqs from an external sequencer.

The recording automatically stops after the required no. of notes have been received, so the 'stop/play' action needs to be defined first by pressing the reqd. stop/play key (as described in the record section above), followed by two digit keys 0-9, specifying the number of notes to be recorded (with leading zeros if necessary).

e.g. to record 16 notes and loop them, press: **cmd, rec-nn, rec-play, 1, 6**

Incoming MIDI stop messages are currently ignored during recording, so the recorded sequence length is measured from the start of the first note to the start of the 'n+1'th note. Your external pattern must be either running in a loop, or one note longer than reqd.

Once primed, the interpreted ports (main P1, and aux P2 if defined) will only respond to control functions, e.g. pressing esc will abort the command. When the recording stops, the interpreted ports switch back to full live mode.

Synchronisation depends on whether or not all seqs are stopped first; if they're all stopped, each recording will restart the metronome so they are guaranteed to line up. If not, it depends on your timing when pressing the second digit key. See the Synchronisation section in the Advanced Operation guide for more details.

7. PITCH CONTROLS

pitch

The next key is a pitch value specifying a relative pitch offset for the selected seqs, or all seqs if none selected, taking effect at the start of their next cycle.

pitch-inc/dec

Increment/decrement current pitch offset by one octave for the selected seqs, or all seqs if none selected, taking effect at the start of their next cycle.

pitch-mode

Same as pitch, but remains in pitch mode until esc is pressed. The input display will flash to warn that the command is in effect, and that the keyboard is not 'live' in this mode. Any pitch offset value keys will pitch-shift the selected seqs, giving the effect of 'playing' a monophonic sampler.

trans

Transpose the current pitch shift value for the selected seqs, or all seqs if none selected. There is no change in pitch, but the current pitch offset is transferred into the 'trans' column and then reset to 0. Subsequent pitch shifts are now relative to this new 'trans' value. This is additive, so you can shift seqs beyond the range of the keyboard.

pitch-lock/unlock

Lock/unlock pitch-shifts for selected seqs, or all seqs if none selected, e.g. to prevent percussion sounds changing during pitch shifts.

8. CYCLIC PITCH

pitch-0

Same as pitch but also reset cyclic pitch action for the selected seqs, or all seqs if none selected.

pitch-1, 2, etc, 32, r, rr, n, nn

Alternate between two pitch offsets every x cycles, starting at the next cycle. The first offset is 0 (i.e. the current pitch), and the second is specified with a pitch value offset entered after the command, e.g.

...**pitch-2, +3** shift +3 semitones for 2 cycles, then reset to the origin for 2 cycles, then repeat.

The n & nn variants also need a 'no. of cycles' value, and this is entered first (using the normal digit value keys), e.g.

...**pitch-n, 3, -5** shift -5 semitones for 3 cycles, then reset for 3 cycles, etc.

...**pitch-nn, 16, +3** shift +3 semitones for 16 cycles, then reset for 16, etc.

- The no. of cycles remaining can be overridden by subsequent commands. To cancel pitch cyclics, use any pitch cyclic command with the no. of cycles set to 0, e.g. ...**pitch n, 0, offset** or ...**pitch-0, offset**.
- You can still use the basic pitch shift command on cyclic pitch seqs; both pitches will be offset by the same amount.
- The total no. of variations is limited in the LE version.
- More variations can be added by request.

9. MIDI ATTRIBUTES

port

The next key is either a single digit key 1-9, or an inc or sweep key, specifying the output port number for the selected seqs, or live output if none selected. Port numbers are defined when ports are allocated during configuration. Changes for seqs take effect at the start of their next cycle; changes for the live output take effect immediately.

digit key: specify the absolute port number (1..9).

inc +/-: increment/decrement current port number; wrapping at min/max limits.

- **sweep 1/2:** the next two keys are the start & end port numbers for the 1-way or 2-way inc/dec sweeps. See the Cyclic modifiers are only available in the full version.

sweep modifier (1/2) section for warnings on sweeping ports on the live output.

e.g. to change seqs 3 & 4 to use port 2, press: **cmd, seq-3, seq4, port, 2**

port-inc/dec

Increment/decrement current port number, wrapping at min/max limits; no further key presses are required. Changes for seqs take effect at the start of their cycle; changes for the live output take effect immediately.

- If you only use one port, un-map all port functions to free-up command keys.

chan

The next keys are either two digit keys 0-9, or an inc or sweep key, specifying the channel number for the selected seqs, or live output if none selected. Changes for seqs take effect at the start of their next cycle; changes for the live output take effect immediately.

digit keys: specify the absolute channel no. (01..16); both digits are reqd, e.g. for channel 5, press: ...**chan, 0, 5**.

inc +/-: increment/decrement current chan number, wrapping at min/max limits.

- **sweep 1/2:** the next four keys are the start & end channel values for the 1-way or 2-way inc/dec sweeps. See the Cyclic modifiers are only available in the full version.

sweep modifier (1/2) section for warnings on sweeping channels on the live output.

chan-inc/dec

Increment/decrement current chan number, wrapping at min/max limits; no further key presses are required. Changes for seqs take effect at the start of their cycle; changes for the live output take effect immediately.

prog

The next keys are either three digit keys 0-9, or a single inc or sweep key, specifying the program/patch-change number for the selected seqs, or live output if none selected. Changes for seqs take effect at the start of their cycle; changes for the live output take effect immediately.

digit keys: specify the absolute prog no. (000..127); all 3 digits are reqd, e.g. to enter program 2, press: ...**prog, 0, 0, 2**.

If your synth programs are numbered 1..128, then 000=1, 001=2 etc.

inc +/-: increment/decrement current prog number, wrapping at min/max limits.

- **sweep 1/2:** the next six keys are the start & end prog numbers for the 1-way or 2-way inc/dec sweeps. See the Cyclic modifiers are only available in the full version.
sweep modifier (1/2) section for warnings on sweeping progs on the live output.

prog-inc/dec

Increment/decrement current prog number, wrapping at min/max limits; no further key presses are required. Changes for seqs take effect at the start of their cycle; changes for the live output take effect immediately.

- If your synth is multi-timbral, but glitches when changing progs on the fly, try pre-configuring the synth with a different sound/patch for each channel, then use the chan commands to change sounds.
- If you don't use prog/patch-changes, un-map all prog functions to free-up command keys.

vel

The next key is either a digit key or a single inc or sweep key, specifying the velocity for the selected seqs, or live output if none selected. Changes for seqs take effect at the start of their cycle; changes for the live output take effect immediately.

digit key: specifies a velocity scale factor (0..9); 0= off, 1 = quietest, 5 = no change, 9 = loudest.

inc +/-: increment/decrement the current velocity; ignored at min/max limits.

sweep 1/2: the next two keys are the start & end velocity values for the 1-way or 2-way inc/dec sweeps.

vel-inc/dec

Increment/decrement current velocity; ignored at min/max limits. Changes for seqs take effect at the start of their cycle; changes for the live output take effect immediately.

- If your main keyboard appears to stop playing live, check the live output velocity has not been set to 0.

10. TIMING & METRONOME

tempo

If sync is internal, the next keys are either three digit keys, a single inc or sweep key, or three tap key presses specifying the global tempo. The rate of change is defined by the tempo slew value.

digit keys: specify the absolute tempo value; all 3 digits are reqd, e.g. for 60bpm, press: **cmd, tempo, 0, 6, 0**.

inc +/-: increment/decrement the current tempo by a fixed amount (configurable); ignored at min/max limits.

sweep 1/2: the next six keys are the start & end tempo values for the 1-way or 2-way inc/dec sweeps. Auto tempo changes are immediate, regardless of slew.

tap key: the tempo is derived from the timing between the 3 tap key presses. The timing is measured either in beats or in crotchets (configurable). If measured in beats, the calculated tempo will depend on the current time-sig.

tempo-inc/dec

Increment/decrement the current tempo by a fixed amount (configurable); ignored at min/max limits. The rate of change is defined by the tempo slew value.

tempo-slew

The next key is a single digit key specifying the number of seconds for internal tempo changes to take effect, 0=immediate.

quant

The next two keys are quantise values specifying two note-length-fractions, taking effect at the start of the next metronome bar; the first for quantising recorded *notes* (NQ) in subsequent recordings, and the second for quantising *seq* start times & recorded *seq* lengths (SQ) in subsequent recordings, e.g. to set NQ to 1/16 and SQ to 1/4, press: **cmd, quant, 1/16, 1/4**.

nq-0, 4, 8, 16

Set note quantise (NQ) to 0 (off), 1/4, 1/8, 1/16, taking effect at the start of the next metronome bar.

- Wait for quantise commands to take effect *before* starting recording.
- The total no. of variations is limited in the LE version.
- More variations can be added by request.

time-sig

The next two keys are time-sig values specifying the beats per bar and beat length for the metronome, taking effect at the start of the next metronome bar.

e.g. to set time-sig to 6/8, press: **cmd, time-sig, 6, 1/8**.

- Wait for the time sig command to take effect *before* starting recording.
- Section 'Time Sig values' describes how the templates display these values.

time-shift+/-

The next two keys are time-shift values specifying the no. of beats and beat length to shift the start time of selected seqs forwards or backwards, taking effect at the start of their cycles.

e.g. to shift back 3 x 1/8 notes, press: ...**time-shift-, 1/3, 1/8**.

- The audible metronome sequence cannot be time shifted.
- Section 'Time Shift values' describes how the templates display these values.

metr

The next two keys are the note values specifying a bar and beat note for the metronome, taking effect at the start of the next metronome bar,

e.g. to set D as the bar & G as the beat, press: **cmd, metr, D, G**

- If you want to use notes which are out of range of your keyboard, enter notes within range, then shift the metronome seq using pitch & transpose commands.

1 1. MISC

part

The next key is either a digit key 1-9, or a single inc or sweep key, specifying the active part no. for the selected seqs, or all seqs if none selected. Changes take effect at the start of their cycles (if already running), or immediately if stopped.

digit key: specify the absolute part number (1..9).

inc +/-: increment/decrement the active part no; wrapping at min/max limits.

sweep 1/2: the next two keys are the start & end tempo values for the 1-way or 2-way inc/dec sweeps.

part-inc/dec

Increment/decrement the active part no; wrapping at min/max limits. Changes take effect at the start of their cycles (if already running), or immediately if stopped.

- New part(s) will continue in their previous play/mute/pitch state(s) if possible.
- Because changes take effect immediately for stopped seqs, changing from a stopped part to a running part forces the latter to stop to avoid loss of sync.
- The total no. of parts is limited in the LE version.

!save

The next keys are either two digit keys 0-9, or a single inc key, specifying the file scene no. to be used for saving the selected seqs, or all seqs if none are selected. If *all* seqs are selected the file is saved as a 'full' scene, otherwise it is a 'partial' scene; see Advanced Operation for details.

e.g. to save all parts of all seqs to full scene 5, press: **cmd, save, 0, 5**

digit key: specify the absolute scene number (00..99), where 00 means use the current full/partial scene no.

inc +/-: increment/decrement the current full/partial scene no. before saving; ignored at min/max limits.

- Seqs can be saved while running as long as they are not in 'part sweep' mode.
- The total no. of scenes is limited in the LE version.

!load

The next keys are either two digit keys 0-9, or a single inc key, specifying the file scene no. to be used for loading selected seqs, or all seqs if none are selected. If *all* seqs are selected, the command looks for a 'full' scene file, otherwise it looks for a 'partial' scene; see Advanced Operation for details.

e.g. to load all parts of all seqs from full scene 5, press: **cmd, load, 0, 5**

digit key: specify the absolute scene number (00..99), where 00 means use the current full/partial scene no.

inc +/-: increment/decrement the current full/partial scene no. before loading; ignored at min/max limits.

- Seqs can only be loaded if they are stopped.
- The total no. of scenes is limited in the LE version.

!reset

If the selected seqs are already stopped, then reset all their attributes (pitch, trans, vel etc.) and send a MIDI reset on each seq's port & channel.

If the selected seqs are running, then stop them immediately and send a MIDI reset on each seq's port & channel, leaving the attributes unchanged.

If no seqs are selected, send a MIDI reset on the Live port & channel.

- The MIDI reset acts as a panic function to silence stuck notes. The diagnostic output trace will show which messages are currently used for this.

!delete

Delete the contents of the selected seqs, leaving the attributes (pitch, trans, vel etc.) unchanged. Seqs must be stopped first.

- If you delete the audible metronome sequence by mistake, it will be re-created whenever you next use the time-sig or metr commands.

esc

Abort command mode and return to live mode. You can press this key at any stage during the command process, even if you are in the middle of entering command values. There is an esc function for each mode, so they *can* be mapped to different keys if you want more advanced layouts; the factory settings map them all to same key as the cmd function.

!calib

The next key defines the live cmd key, for use when initially calibrating your keyboard, or if your keyboard has an octave switcher which you want to use. When the next key is pressed, the Sequetron's octave offset will be adjusted to synchronise the key maps with the octave setting on your MIDI keyboard.

- Use the command in the following order to avoid losing sync:-
 1. Press the calibrate command key.
 2. Switch octaves on your MIDI keyboard.
 3. Press the key you want to nominate as the new live cmd key.
- Suitable defaults will be assigned to unmapped keys as the offset is moved:-
'live' & 'record' for live & record modes, rel & note for pitch & metr values, and 'ignore' for everything else.
- If the Key Mapper is displayed (click 'Config, Key mapper'), it will update its maps from the main port 1 offset value.
- The current offset value for the main port can be used to adjust (normalise) the key maps when the config is saved; this avoids manually editing each key if you only want to move them up or down in octaves.
- If you get the keyboard out of sync with the key maps, you can
 - either:** use your MIDI keyboard octave switch to re-align it,
 - or:** if the PC is handy, click the 'Calibrate' button or press its shortcut 'k' key, then press the cmd key,
 - or:** if the PC is handy, click the octave offset buttons as reqd.
- The default octave reference key is C (the factory live Cmd function is mapped to the C1 key). This means you can only press C keys (C1, C2, C3 etc) when calibrating. To change this, e.g. if your keyboard starts on E, use the Key Mapper to map the live Cmd function to the reqd key. The Key Mapper will give you the option of making it the new reference key.
Alternatively, edit the config file manually and reload it.

12. COMMAND VALUE NOTES

Some commands need further information (values) to complete them, e.g. the tempo command needs a bpm value, channel needs a channel number etc.

To minimise the number of keys and key presses, values are entered in different ways depending on the command. There is no 'enter' key by design, so the command terminates automatically when the final value key is pressed. The command can be aborted at any time by pressing the esc key.

You can map all these value keys anywhere on the keyboard; they don't all have to be used; they don't have to be contiguous, and they can be duplicated if reqd. e.g. the factory settings overlap similar number-related keys to simplify the template.

Digit & Modifier values

digits [0-9]

These are used to enter absolute values from 0 to 999; the number of key presses required (1, 2 or 3) depends on the command, e.g.

- Velocity values range from 0-9, so only press one digit, e.g. ...**vel**, **5**
- Channel values range from 1-16, so press two digits in order, using a leading '0' if necessary, e.g. ...**chan**, **0**, **5**
- Prog/patch values range from 0-127, so press 3 digits in order, using leading '0's if necessary, e.g. ...**prog**, **0**, **0**, **3** or ...**prog**, **0**, **4**, **5**

The input line on the display shows the digits as you enter them.

inc modifier [+/-]

These modify the command by removing the need to enter an absolute value, instead inc/decrementing the current value by a command-dependent amount. e.g.

...**chan**, **+** increments the current channel no. by 1.

...**part**, **-** decrements the current part no. by 1.

cmd, **tempo**, **+** increments the current tempo by 5 bpm (configurable).

Most commands also have a direct inc/dec variant, such as chan-inc, chan-dec, and you can mix & match these as reqd, trading off fewer key-presses against more dedicated command keys, e.g. to increment the chan...

you could press two keys: ...**chan**, **+**

or a single key: ...**chan-inc**

...or you can use absolute values and press 3 keys: ...**chan**, **1**, **2**

cyclic modifier [/]

This is only valid for a cyclic 'n' or 'nn' command, and modifies the command to expect a *pair* of values defining the 1st and 2nd values for the cyclic action. The 'n' variants expect a pair of single digit values, the 'nn' variants expect a pair of 2 digit values with leading zeros if necessary, e.g.

...**playmute-n**, **/**, **3**, **1** plays for 3 cycles, then mutes for 1 cycle, etc.

...**playmute-nn**, **/**, **0**, **8**, **3**, **2** plays for 8 cycles, then mutes for 32 cycles, etc.

If you don't use the cyclic modifier key, the command just expects a *single* value which is used for both counts, e.g.

...**playmute-n, 3** plays for 3 cycles then mutes for 3 cycles, etc.

- Cyclic modifiers are only available in the full version.

sweep modifier (1/2)

These modify the command to expect a *pair* of values defining the start & end limits to be used for an automatic inc/dec action, taking effect at the start of each cycle for selected seqs, or the start of the metronome bar if the live output is selected.

...**sweep1 [-->]** sweeps one way between the 1st and 2nd limits, then repeats.

...**sweep2 [<-->]** sweeps two ways between 1st and 2nd then back from 2nd to 1st then repeats.

Each value needs the same no. of digits as you would normally use for that command, e.g.

...**vel, <-->, 2, 5** sweeps vels 2,3,4,5,4,3,2,3,4,5... etc.

...**prog, <-->, 0, 0, 7, 0, 1, 1** sweeps progs 7,8,9,10,11,10,9,8,7,8,9... etc.

...**chan, -->, 0, 3, 0, 5** sweeps channels 3,4,5,3,4,5,3,4,5... etc.

...**chan, -->, 1, 5, 1, 2** sweeps channels 15,14,13,12,15,14,13,12... etc.

The sweep always starts at the 1st limit entered regardless of which value is bigger.

To cancel a sweep action, use a non-sweep variant, e.g.

...**vel, 5** sets the velocity to 5, cancelling any existing vel sweep action.

...**chan, 0, 3** sets the chan no. to 3, cancelling any existing chan sweep action.

The modifiers can be preceded by one or more seq-selects, giving you some powerful creative effects; sweeping different parameters on different seqs, contra-sweeps, sweeping part numbers, etc.

- Warning 1: Depending on your synth and/or how you play the Sequetron, you may get glitches or stuck notes when sweeping Port, Chan or Prog values on the live output. The live output is automatically selected by these commands as a default action if you don't select any seqs, so to avoid this happening by accident, you can disable the default action by altering a config setting. Note that prog changes applied to seq(s) can also affect the live output indirectly if they share the same port & channel.
- Warning 2: If your keyboard is part of the synth and the synth uses different octave ranges for each prog-change (e.g. microKORG), your key-mapping may get out-of-step as the progs change, giving the impression your command keys no longer work.
- Sweep modifiers are only available in the full version.

Time Sig values

These keys specify both the numerator (beats per bar) and denominator (beat length) values for the time-signature command, and are pressed in that order; two key presses are reqd.

To avoid cluttering the keyboard template, '1/n' indicates either 'n' beats, or a beat length of '1/n'. Beat lengths which are invalid divisions are ignored, so those keys are just marked as 'n', e.g. '7'.

e.g. to enter a time sig of 3/4, press: **cmd, time-sig, 3, 1/4**

for 12/16, press: **cmd, time-sig, 12, 1/16**

for 7/8, press: **cmd, time-sig, 7, 1/8**

Time Shift values

These keys specify both the number of beats and beat length values for the time-shift commands, and are pressed in that order; two key presses are reqd.

To avoid cluttering the keyboard template, '1/n' indicates either 'n' beats, or a beat length of '1/n'. Beat lengths which are invalid divisions are ignored, so those keys are just marked as 'n', e.g. '7'.

e.g. to enter a shift of 3 x 1/4 notes, press: ...**timeshift, 3, 1/4**

to shift 12 x 1/16 notes, press: ...**timeshift, 12, 1/16**

to shift 7 x 1/8 notes, press: ...**timeshift, 7, 1/8**

Tap Tempo keys

These keys can be used instead of digit keys for the tempo command to enter a value by tapping any of them in time with the beat reqd.

You can map any keys to be a 'tap' value key, from none to all remaining keys. You can tap the same key, or any of them in any order. The tempo command terminates after 3 taps, when the new tempo is calculated from the average timings. Timing can be configured to measure either the current beat length (so is dependent on the time sig), or a standard crotchet length.

Quantise keys

These keys specify both beat length values for the quantise command for NQ (recorded note quantise) and SQ (seq start time & recorded length quantise), and are pressed in that order; two key presses are reqd.

e.g. to quantise recorded notes to the nearest 1/16 note, and the seq start times/lengths to the nearest 1/4 note, press: **cmd, quant, 1/16, 1/4**

The '0' key turns off note quantisation, but is ignored if used for the seq value. This avoids having to re-enter the current value if you don't want to change it. SQ cannot be turned off otherwise it would be almost impossible to sync sequences together.

Pitch keys

These keys specify the relative pitch offset for the pitch and pitch-mode commands; only a single key press is reqd.

You can map any keys to be a 'pitch offset' value key, but the actual offset is defined by where it lies on the keyboard in relation to the pitch origin key. You can only have one pitch origin key.

To shift outside the range of the keyboard, use the pitch or pitch-inc/dec commands, then 'lock in' the current offset with the transpose command, repeating as necessary.

Metronome note keys

These keys specify both the bar and beat note values *and their velocities* for the metr command, and are pressed in that order; two key presses are required.

You can map any keys to be a 'metr note' value key, but the actual note is defined by where it lies on the keyboard.

To move the notes outside the range of the keyboard, use the pitch or pitch-inc/dec commands, then 'lock in' the current offset with the transpose command, repeating as necessary.

13. CYCLIC COMMAND NOTES

The cyclic commands switch between two states after a specified no. of cycles. This increases the syncopation possibilities, and also allows you to 'program' changes in advance to minimise command mode activity while playing/improvising live.

The states are described in the individual command sections.

Further automation is available using the sweep modifiers.

Each cyclic command has 3 variants for specifying the no. of cycles:-

1. A dedicated command for each fixed number, e.g. play-4, mute-32, pitch-rr.
Commands supplied are: 0, 1, 2, 4, 8, 16, 32, r (random 1 to 9), rr (random 1 to 99), but others can be added by request.
Pros: Simplest to use as there are no further keys to press. Because they are single keys, the play & mute commands are also available in record mode to stop/play the recording.
Cons: Each one needs a dedicated command key.
2. One command plus a single digit value, e.g. play-n, play-mute-n, pitch-n
Pros: A range of 0 to 9 cycles from one command key.
Cons: One extra key-press reqd to enter the single digit value. Cannot be used in record mode because of this. Limited to 9 cycles max.
3. One command plus a double digit value, e.g. play-nn, mute-nn, pitch-nn
Pros: A range of 0 to 99 cycles from one command key.
Cons: Two extra key-presses reqd to enter the double digit value. Cannot be used in record mode because of this.

You can mix any combination of variants depending on your keyboard size and musical requirements. The Sequetron LE version has a subset of these variants (see individual command details above).

The cyclic **play/mute** actions can be reset by using either another cyclic command with the no. of cycles set to 0, or by using the normal play or mute commands, whereas the cyclic **pitch** action can only be reset by using a pitch cyclic command with its no. of cycles set to 0. This is because the normal pitch command performs a more useful function by shifting the complete cyclic action up or down. This means that if you only map fixed number pitch commands with no 'n' or 'nn' variants, you must include the pitch-0 command to provide a reset function.