VEIRA

RHYTHMIC FILTER

VEIRA Motion Filter

User Manual

A filter that moves with your song. On every step it picks a new shape, cutoff and resonance and glides there, locked to the song's position, so every playback and every bounce is the same.



Contents

Welcome 3
Getting started 4
What you need 4
Install with VEIRA Manager 4
Activation and the licence 5
Formats and where the files go 5
The panel at a glance 6
Quick start: a moving filter in four moves 7
Using the controls 7
How a moving filter works 9
What a filter does 9
Steps instead of sweeps 9
Inside VEIRA Motion Filter 10
Latency, bypass and bouncing 11
Controls 12
RATE, CHAOS, LOW and HIGH 12
SHAPES and RESONANCE 14
GLIDE 15
PATTERN, NEW and REPEAT 16
MIX, OUTPUT and AUTO LEVEL 18
Steps in time 20
Note values 20
The pattern follows the song 20
REPEAT and the bar 21
Displays 22
The MOTION display 22
The STEPS lane 23
Meter bridge (IN | OUT) 24
Presets 26
The preset browser 26
The preset menu 26
Saving your own presets 26
Presets in your DAW 27
The factory folders 27
Recipes 29
A beat filter on a drum loop 29
A wobble bass 29
Rhythmic keys or a pad 29
A build-up on the mix bus 29
Finding and keeping a pattern 29
Movement nobody notices 30
Specifications 31
Troubleshooting and questions 32

Welcome

Thank you for choosing **VEIRA Motion Filter**. It is a filter that changes with the music: on every step of the song (every beat, with RATE at 1/4) it picks a new shape (low pass, high pass, band pass, notch or peak), a new cutoff and a new resonance, and glides there. Put it on a drum loop and every beat has its own colour; on a bass, a wobble; on chords, a rhythmic wah; on the mix bus, a build-up or a breakdown.

You don't draw the movement by hand. You tell VEIRA Motion Filter **how often** it changes (RATE), **which shapes** it may use (SHAPES), **where** it moves (LOW and HIGH), **how far** each step may wander (CHAOS), **how sharp** the filter is (RESONANCE) and **how smoothly** it moves (GLIDE). It writes the pattern from a number, PATTERN, and NEW gives you another one. REPEAT loops the pattern every 1, 2 or 4 bars so it becomes a riff, and AUTO LEVEL keeps the sound as loud as it came in, so the steps move the tone, not the level.

What makes it different

- **It follows the song, not the clock.** Each step is worked out from where the song is: step 12 of the song always gets the same filter, so every playback and every bounce sounds the same, and starting playback in the middle of the song gives the step that belongs there.
- **Patterns you can keep.** A pattern is a number from 1 to 999. Press NEW until one grooves; the number is saved with your session and in your presets, so it comes back exactly.
- **Riffs, not noise.** REPEAT loops the pattern every 1, 2 or 4 bars, so the movement becomes part of the arrangement.
- **The level stays.** A band pass or a high pass takes a lot of sound away. AUTO LEVEL gives every filter setting the gain that keeps your track's loudness, without pumping, and a guard keeps it from pushing peaks far over the input's.
- **Morphs, not switches.** A change of shape glides like a change of cutoff, so even hard, fast steps don't click.
- **No latency.** The plug-in adds no delay, so it's as happy on a live input as on the mix bus.
- **A clean, legible face.** Knobs with their value in the middle, text you can read at a glance, and a window you can scale from 75 % to 200 %.
- **38 measured presets** in 10 folders: drums, bass, guitar, keys, vocals and the mix bus, plus *Rhythmic*, *Sweeps* and *Creative FX*.

How this manual is organised. *Getting started* covers installing and activating. *The panel at a glance* names every part of the window and has a quick start. *How a moving filter works* explains, without maths, what each filter shape does and how VEIRA Motion Filter builds its steps. *Controls* explains every control, with drawings computed from the plug-in's own engine. *Steps in time* covers the note values, REPEAT and how the pattern follows your song. *Displays* teaches you to read the MOTION display, the STEPS lane and the meter bridge, and *Presets*, *Recipes*, *Specifications* and *Troubleshooting* follow.

Getting started

What you need

macOS	macOS 11 Big Sur or later. Native on Apple silicon and Intel Macs (universal).
Windows	Windows 10 or 11, 64-bit.
Plugin formats	VST3 (macOS and Windows), Audio Units (macOS), and a standalone app. Pro Tools (AAX) versions arrive once they are signed for Pro Tools.
Hosts	Any DAW that loads VST3 or Audio Units: Logic Pro, Cubase, Nuendo, Ableton Live, Studio One, Reaper, FL Studio, Bitwig and others.
Account	A VEIRA account at veiraaudio.com, and the free **VEIRA Manager** app.
Internet	Needed to install and to refresh the licence. The plugin itself never goes online.

Install with VEIRA Manager

VEIRA plugins are not downloaded from the website one by one. You install them with **VEIRA Manager**, the free VEIRA app that installs, updates and activates everything you own. Its own manual covers it in full; the short version is:

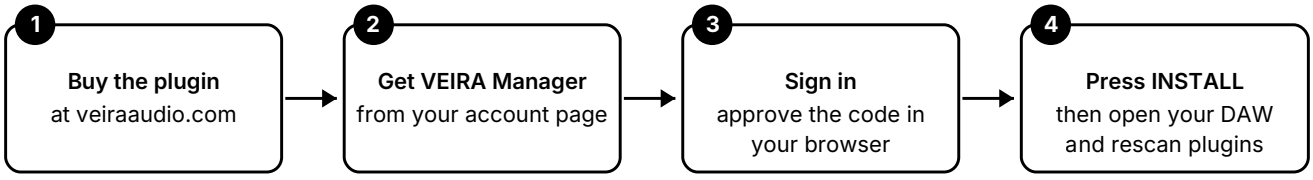


FIGURE 1 From purchase to first sound in four steps.

1. **Buy** VEIRA Motion Filter at **veiraaudio.com**. It's a one-time purchase: you own it for good, with free updates.
2. **Download VEIRA Manager** from your account page (or veiraaudio.com/manager) and install it.
3. **Sign in.** VEIRA Manager shows a short code and opens your browser; confirm the code there. Your password is never typed into the app.
4. Find VEIRA Motion Filter in the list and press INSTALL. When it says SHOW, it's installed. Open your DAW and let it rescan its plugins.

After installing, VEIRA Motion Filter appears in your DAW under the manufacturer **VEIRA** (in Logic Pro: Audio Units ▸ VEIRA ▸ VEIRA Motion Filter).

Activation and the licence

VEIRA Manager keeps a licence on your computer that the plugins check. It is refreshed every time VEIRA Manager opens and stays valid for 30 days offline, so you can work without internet as long as you open VEIRA Manager now and then.

Without a valid licence, VEIRA Motion Filter still loads and works, but **its sound fades out for 1.5 seconds every 30 seconds**, and a strip along the bottom of its window says why (for example, *NOT ACTIVATED ON THIS COMPUTER. SIGN IN WITH VEIRA MANAGER.*). Clicking the strip opens your account page.

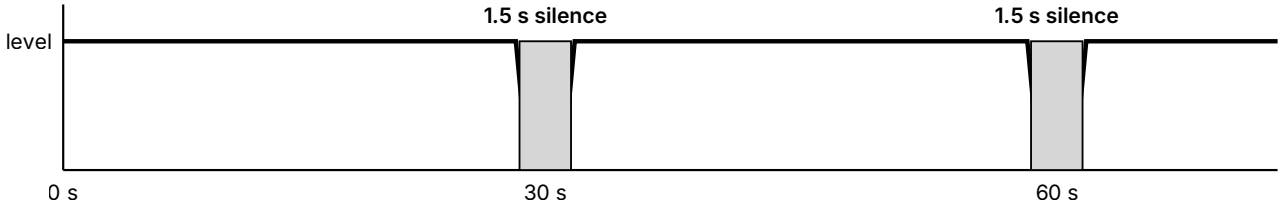


FIGURE 2 What an unlicensed copy does. With a valid licence the audio is never touched.

- **Activating while your DAW is open** takes effect within about two minutes. You don't need to reload the plugin.
- **"Not activated on this computer"**: open VEIRA Manager and sign in.
- **"Expired"**: open VEIRA Manager while online; it renews the licence at once.
- **"Not included"**: the signed-in account doesn't own VEIRA Motion Filter. Check that you're signed in with the account you bought it with.

Formats and where the files go

VEIRA Manager puts every format in the standard place, so you never need to copy files by hand:

Format	macOS	Windows
VST3	`~/Library/Audio/Plug-Ins/VST3` (just for me, the default) or `/Library/Audio/Plug-Ins/VST3` (all users)	`C:\Program Files\Common Files\VST3` (all users, the default) or `%LOCALAPPDATA%\Programs\Common\VST3`
Audio Units	`~/Library/Audio/Plug-Ins/Components` or `/Library/Audio/Plug-Ins/Components`	(Audio Units are macOS only)
Standalone	`~/Applications/VEIRA` or `/Applications/VEIRA`	`C:\Program Files\VEIRA` or `%LOCALAPPDATA%\Programs\VEIRA`

You choose *just for me* or *all users* in VEIRA Manager's install settings.

The standalone app runs VEIRA Motion Filter on its own, with your audio interface's input and output, which is handy for trying presets without a DAW.

The panel at a glance



FIGURE 3 VEIRA Motion Filter with the factory preset *Default ▸ Init* (RATE 1/4, CHAOS 50 %, 200 Hz to 5 kHz, REPEAT OFF) while a mix plays at 120 BPM.

	Part	What it does
1	Preset browser	Steps through and saves presets. See *Presets*.
2	MOTION display	The filter now and on the next step, over the range set by LOW and HIGH.
3	STEPS lane	The pattern around the step that's playing: each step's shape and cutoff.
4	SHAPES	The filter shapes the steps choose from: LP, HP, BP, NOTCH, PEAK.
5	REPEAT	Loops the pattern every 1 BAR, 2 BARS or 4 BARS, or not at all (OFF).
6	PATTERN and NEW	Which pattern plays (1 to 999); NEW picks another.
7	RATE	How long each step lasts, as a note value at the song's tempo.
8	CHAOS	How far the steps wander from the middle of the range.
9	LOW and HIGH	The range the cutoffs are chosen from.
10	RESONANCE	How sharp the filter is at its cutoff.
11	GLIDE	How smoothly the filter moves from one step to the next.
12	MIX	The filtered sound against the dry signal.

	Part	What it does
13	OUTPUT	The level going out.
14	AUTO LEVEL	Keeps the sound as loud as the input, whatever the filter does.
15	Meter bridge	Input and output level and loudness.

The window has three bands. Across the top, the **MOTION display**, with the **STEPS lane** along its bottom edge. Under it, a row of buttons: SHAPES, REPEAT and PATTERN. At the bottom, the knobs, from left to right in the order you'll usually set them: RATE and CHAOS (the big knob), LOW and HIGH, RESONANCE and GLIDE, then, after a thin divider, MIX, OUTPUT and the AUTO LEVEL switch. The **meter bridge** runs down the right.

Quick start: a moving filter in four moves

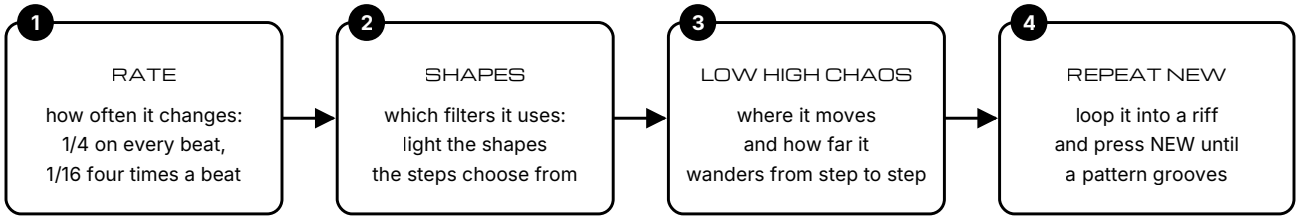


FIGURE 4 The quickest way to a good result. Start from a preset close to your job, or from *Init*, and work from left to right. The level stays the same whatever you turn, so judge by ear.

Using the controls

Every VEIRA plugin is played like a piece of hardware. The same few parts appear on every panel:

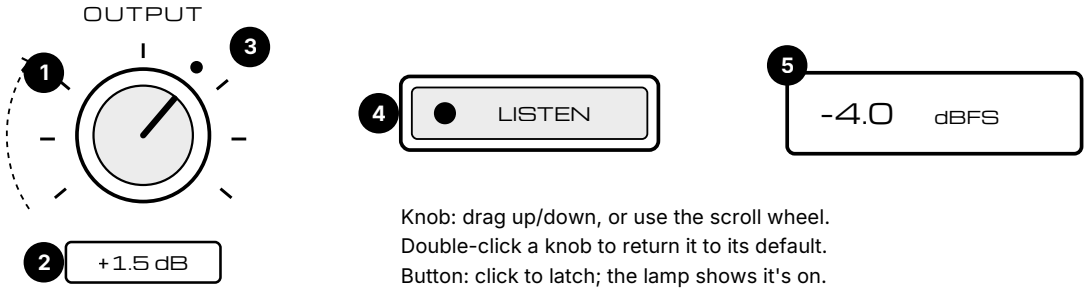


FIGURE 5 The parts you'll find on every VEIRA panel (the labels are examples).

- 1 **Knob.** Drag up to turn it clockwise, down to turn it back, or use your mouse wheel. **Double-click** returns it to its default. The engraved pointer and the small dot on the scale show where it's set.
- 2 **Value window.** The backlit window under each knob shows its exact value with its unit.
- 3 **Silkscreen label.** The control's name, as it appears in your DAW's automation list.

- 4 **Push button.** Click to switch on; the lamp lights and the cap sits lower in its bezel. Click again to switch off.
- 5 **Readout.** Live numbers update ten times a second so you can read them while the meters move. A value over 0 dBFS shows as a warning.

Tooltips: hover over any control or display for a short explanation. On displays, the tooltip depends on where you point.

Automation: every knob and button is a host parameter, so you can automate it in your DAW and control it from a MIDI controller or control surface that your DAW maps.

Units: VEIRA never shows a bare number. **dBFS** is level against digital full scale (0 dBFS is the loudest a digital signal can be); **dB** is a change in gain; **LUFS** is loudness as streaming services and broadcasters measure it; **LU** is a difference in loudness (1 LU = 1 dB).

On VEIRA Motion Filter's panel the parts look a little different from the drawing above:

- **Knobs** show their value **in their middle**, with a short pointer tick at the rim, and a lit ring (blue on screen; in print, the lighter arc) shows how far each is turned. Drag, use the wheel, or double-click (or Alt/Option-click) for the default, as on every VEIRA knob.
- **Type a value:** right-click a knob (Control-click on a Mac). A field opens over the knob with the current value; type the new one and press Return. The number is enough: **70** for CHAOS, **800** for LOW. Press Escape or click elsewhere to leave it unchanged.
- **Resize the window:** drag its bottom-right corner (the small diagonal lines). It scales from 75 % to 200 % of its normal size and keeps its proportions, so everything stays sharp. Your DAW saves the size with the session.

The SHAPES buttons are five on/off switches: click one to light it (orange on screen; the lit buttons are the solid, bright ones, the others dark with an outline), and click again to switch it off. Any number can be lit at once. **The REPEAT buttons** work like radio buttons: the one you click lights and the others go out. NEW is a push button: each click picks a new pattern and the number in the PATTERN window changes. AUTO LEVEL is a switch: its knob sits to the right and the track lights orange when it's on.

> **Tip:** In your DAW's automation list, the controls appear under their panel names, with one exception: the five SHAPES buttons are listed as *Low Pass*, *High Pass*, *Band Pass*, *Notch* and *Peak*.

How a moving filter works

If you have used the filter on a synthesiser or a DJ mixer, much of this will be familiar. These pages explain what a filter does to a sound, and how VEIRA Motion Filter decides where to move it.

What a filter does

A filter lets some frequencies through and turns others down. Where it starts to act is its **cutoff**; how sharply it acts around the cutoff is its **resonance** (or Q). VEIRA Motion Filter has five shapes:

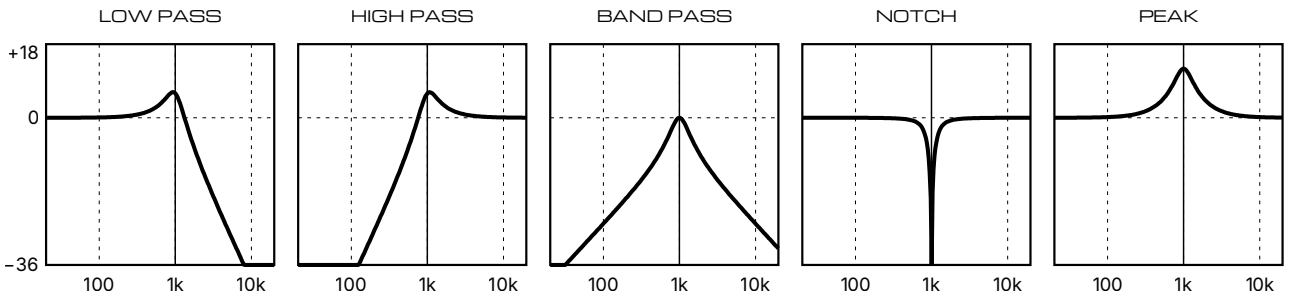


FIGURE 6 The five shapes, each with its cutoff at 1 kHz and [RESONANCE] at 40 % (the default), computed from the plug-in's own filter. The scale is the MOTION display's: +18 to −36 dB, 20 Hz to 20 kHz.

- **LOW PASS** ([LP]) keeps the lows and turns down everything above the cutoff, 12 dB for each octave: the sound goes **darker**, muffled at a low cutoff, as if behind a door. This is the classic synth and DJ filter.
- **HIGH PASS** ([HP]) is the opposite: it keeps the highs and thins out everything below the cutoff. The sound goes **thinner**, lighter, small; a high cutoff leaves little more than the attack and the air.
- **BAND PASS** ([BP]) keeps a band around the cutoff and turns down both sides: the **telephone** or **wah** sound. It takes away the most, which is why [AUTO LEVEL] matters most for it.
- **NOTCH** cuts a narrow band at the cutoff and leaves the rest: a **hole** in the sound, the swirl of a phaser when it moves.
- **PEAK** boosts a band at the cutoff by 12 dB and leaves the rest: a **vowel-like**, nasal colour that talks as it moves.

With more resonance, the low, high and band pass ring at the cutoff (a little bump that turns into a whistle at high settings), and the notch and the peak get narrower. See *RESONANCE*.

Steps instead of sweeps

A synth filter is usually swept: a knob, an envelope or an LFO moves the cutoff smoothly up and down. VEIRA Motion Filter works in **steps**, like a step sequencer: the song is cut into equal steps ([RATE]), and each step gets a filter setting of its own. Between two steps the filter **glides** to the new setting ([GLIDE]): a quick slide at a low setting, a slow sweep that takes the whole step at a high one.

Where a step's setting comes from is the plug-in's job. For each step, VEIRA Motion Filter draws three numbers from the PATTERN number and the step's place in the song, and turns them into:

1. **a shape**, chosen evenly from the SHAPES that are lit;
2. **a cutoff**, between LOW and HIGH, spread around the middle of that range by CHAOS;
3. **a resonance**, set by RESONANCE and lowered on some steps by CHAOS.

The numbers look random, but they aren't: the same pattern and the same step always give the same setting. That's what makes the pattern repeatable, and why a pattern number you like comes back exactly.

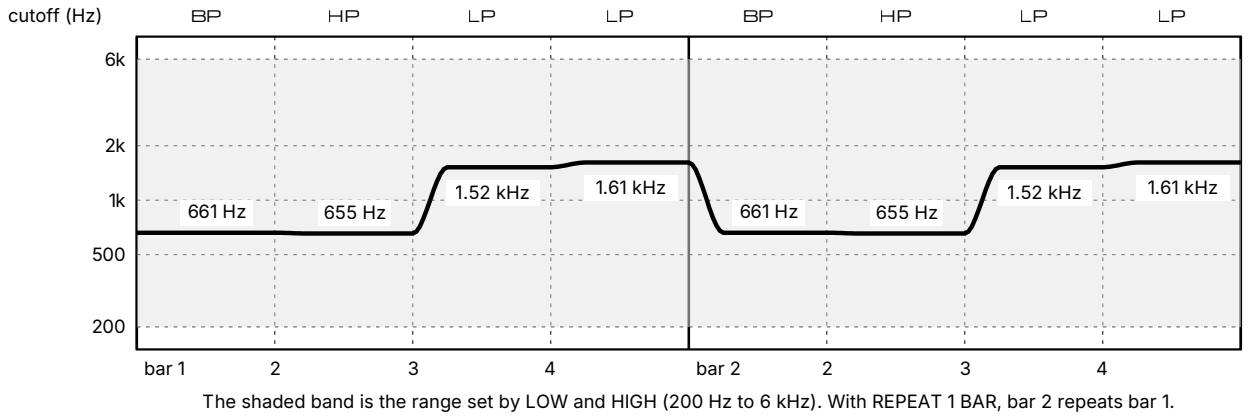


FIGURE 7 The first two bars of *Beat Filter*: one step per beat, its shape above, its cutoff as the heavy line. At each beat the filter glides to the new cutoff over the first quarter of the step (GLIDE 25 %), then holds. Computed from the plug-in's own pattern.

Inside VEIRA Motion Filter

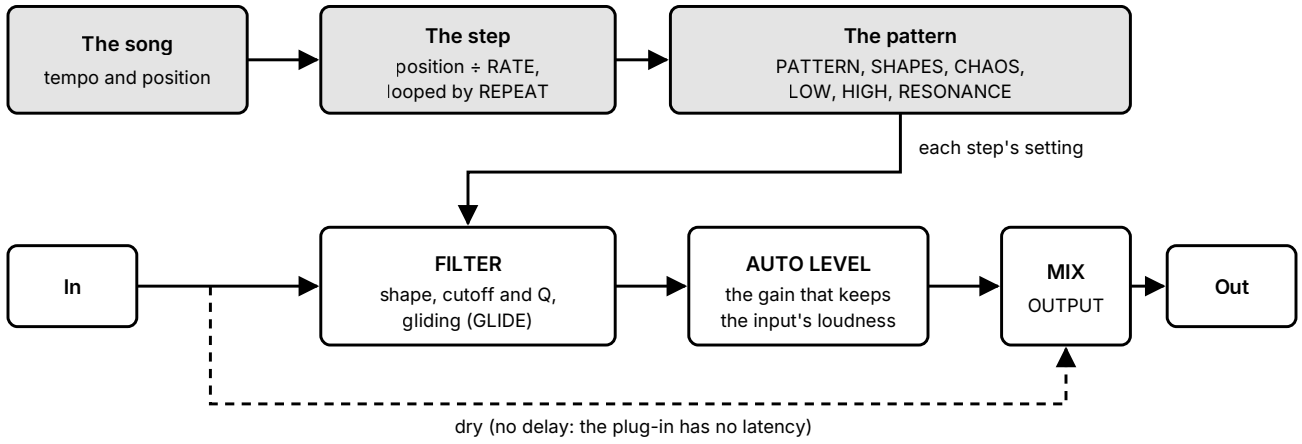


FIGURE 8 Signal flow. Along the top, how the filter's setting is chosen; along the bottom, the sound: the filter, AUTO LEVEL, then the blend with the dry signal (dashed) and OUTPUT.

Step by step:

1. **The song.** At the start of every block of audio, the plug-in reads the song's tempo and position from your DAW (and, for REPEAT, its time signature).

2. **The step.** The position, divided by the length of a step (RATE), says which step of the song is playing. With REPEAT on, the steps are counted round a loop of 1, 2 or 4 bars.
3. **The pattern.** That step, with PATTERN, SHAPES, CHAOS, LOW, HIGH and RESONANCE, gives the filter setting: a shape, a cutoff and a Q.
4. **The filter** glides to that setting (GLIDE) and filters the sound. The cutoff, the Q and the shape all glide, so a change of shape is a smooth morph from one to the other.
5. AUTO LEVEL gives the filter's output the gain that keeps your track as loud as it came in. See *AUTO LEVEL*.
6. MIX blends the filtered sound with the dry signal, and OUTPUT sets the level.

Latency, bypass and bouncing

- **No latency.** VEIRA Motion Filter adds no delay at all, so the dry and filtered signals line up exactly and you can play or sing through it live.
- **Bypass** switches straight to the input.
- **Bounces** (export, bounce in place, render, freeze) sound exactly like playback: the steps come from the song's position, not from when you pressed play, so the same bar always gets the same filter.

Controls

RATE, CHAOS, LOW and HIGH

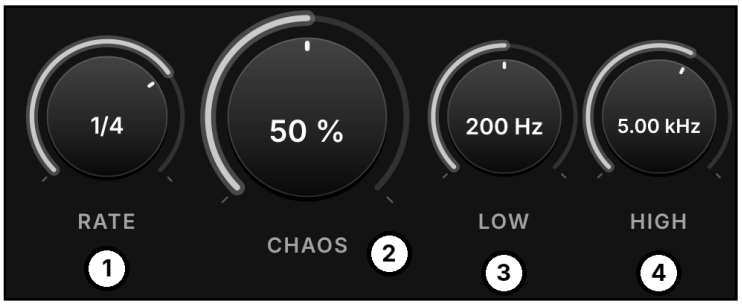


FIGURE 9 The pattern knobs, with *Init*: 1 RATE (1/4), 2 CHAOS (50 %), 3 LOW (200 Hz) and 4 HIGH (5.00 kHz), each with its value in its middle.

Control	Range	Default	What it does
RATE	1/32, 1/16T, 1/16, 1/8T, 1/8, 1/4T, 1/8D, 1/4, 1/4D, 1/2, 1/1	1/4	How long each step lasts, as a note value at the song's tempo. 1/4: a new filter on every beat.
CHAOS	0 to 100 %, in 1 % steps	50 %	How far the steps' cutoffs spread from the middle of the range, and how much their resonance varies.
LOW	20 Hz to 2 kHz	200 Hz	The lowest cutoff a step can get.
HIGH	500 Hz to 20 kHz	5.00 kHz	The highest cutoff a step can get.

RATE

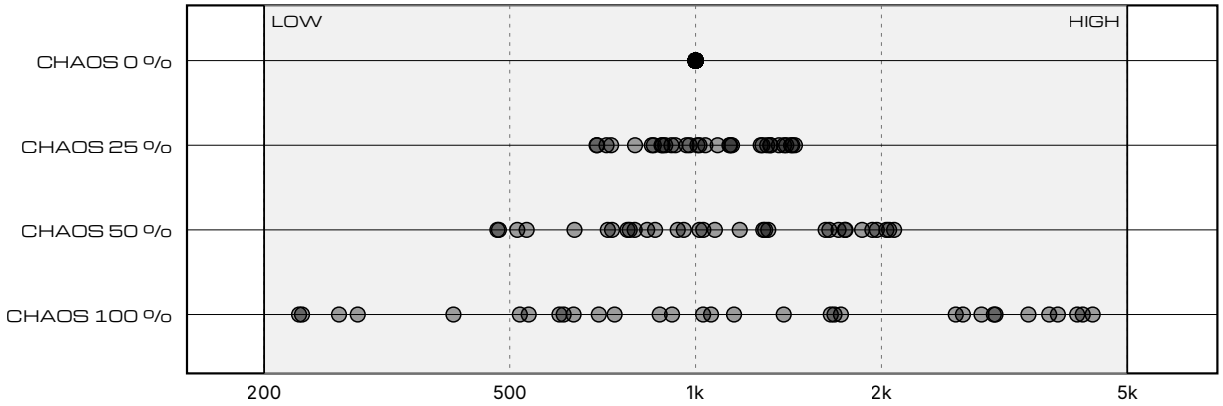
RATE sets the length of a step as a note value, so the steps always fit the song's tempo: at 1/4 the filter changes on every beat, at 1/8 twice a beat, at 1/16 four times, at 1/2 every other beat and at 1/1 once a bar (in 4/4). "T" values are triplets (two thirds as long: 1/8T is three steps per beat), "D" values are dotted (one and a half times as long: a 1/8D step lasts three sixteenths, four steps every three beats). *Steps in time* has the full table, with each length at 120 BPM.

As a rule: **slow rates** (1/2, 1/1) give sweeps that follow the phrase, especially with plenty of GLIDE (*Pad Motion*, *DJ Steps*); **the beat and the eighth** (1/4, 1/8) are the classic rhythmic filter (*Beat Filter*, *Bass Wobble*); **sixteenths and faster** turn the movement into a rhythm of its own, chopped and busy (*Sixteenth Gate*, *Thirty Second Rush*).

The knob shows the note value in its middle. A RATE change takes effect at once: the filter glides to the setting of the step that is now playing.

CHAOS

CHAOS decides how far each step's cutoff may land from the **middle of the range** (the middle on a musical scale, in octaves: between 200 Hz and 5 kHz, that's 1 kHz).



Each dot is one step's cutoff (32 steps, PATTERN 1). At 0 % every step sits at the middle of the range, 1 kHz.

FIGURE 10 Where the cutoffs of 32 steps land at four CHAOS settings, with *Init*'s range (200 Hz to 5 kHz) and PATTERN 1. Computed from the plug-in's own pattern.

- **0 %:** every step sits exactly in the middle of the range. Only the shape changes from step to step, which is a sound of its own: a low pass, a high pass and a band pass at the same cutoff.
- **25 to 50 %:** the cutoffs spread over the middle quarter to half of the range (at 50 %, between 200 Hz and 5 kHz: from about 450 Hz to 2.2 kHz). Movement with a centre: the default.
- **75 to 100 %:** the cutoffs reach right out to LOW and HIGH. At 100 % any cutoff in the range is as likely as any other: the widest, wildest movement.

CHAOS also varies the **resonance**: the higher it is, the more some steps fall below the RESONANCE you set (at 100 %, down to half of the knob's travel). That makes the steps differ in sharpness as well as in pitch.

> **Tip:** CHAOS and the range work together. For a big movement within a small range (a wah around 1 kHz), set LOW and HIGH close and CHAOS high; for small movements over a large range, set them far apart and CHAOS low.

LOW and HIGH

LOW and HIGH set the **range** the cutoffs are chosen from; the MOTION display shades it. LOW runs from 20 Hz to 2 kHz, HIGH from 500 Hz to 20 kHz, so the two can overlap: if you set LOW above HIGH, the plug-in simply uses the range between them. Setting both to the same value fixes the cutoff: only the shape (and with CHAOS, the resonance) changes.

What range to use depends on the job:

- **Bass:** 80 Hz to 1.2 kHz (*Bass Wobble*), up to 3.5 kHz for an acid line.
- **Drums and the mix:** 200 Hz to 6 or 9 kHz, the whole body of the sound.
- **Guitar, keys and vocals:** about 400 Hz to 3 kHz for a wah or a vowel; higher for shimmer (*Hat Shimmer*, *EP Shimmer*: from 1.5 kHz).
- **The air** of a vocal or a mix: from 2 kHz up (*Breathing Air*).

The knobs read in Hz under 1 kHz (200 Hz) and kHz above (5.00 kHz).

SHAPES and RESONANCE



FIGURE 11 1 The SHAPES buttons: LP, HP and BP lit (orange on screen, the solid buttons), NOTCH and PEAK off.

Control	Range	Default	What it does
SHAPES	LP, HP, BP, NOTCH, PEAK, each on or off	LP, HP, BP on	The shapes the steps choose from, evenly.
RESONANCE	0 to 100 %, in 1 % steps	40 %	How sharp the filter is at its cutoff: Q 0.6 to 12.

SHAPES

Each step picks one of the lit shapes, each as likely as the others. The shapes you light set the character of the whole pattern:

- **One shape** gives a single kind of movement: LP alone is the classic opening and closing filter (*Kick Pump Filter*, *Bass Wobble*, *Pad Motion*), HP alone a thinning, rising build-up (*Build Up Motion*, *Tide*), BP alone a wah (*Auto Wah Steps*), NOTCH alone a phaser (*Phaser Drift*).
- LP **and** HP swing between dark and thin: the DJ's filter (*DJ Steps*, *Rhythm Sweeper*).
- LP, HP **and** BP (the default) give the most contrast from step to step: the chopped, edited sound (*Beat Filter*, *Vocal Chop Filter*).
- NOTCH **and** PEAK leave most of the sound in place and move only a band: subtle, phaser-like or vocal movement (*Phase Steps*, *Subtle Glue Motion*, *Organ Vowels*).
- **All five:** the most variety (*Sixteenth Gate*, *Chaos Machine*).

If you switch every shape off, the steps use LP. A change of SHAPES while the music plays glides the filter to the new setting of the step that's playing, over at least 20 ms.

RESONANCE

RESONANCE sets how sharp the filter is at the cutoff, from Q 0.6 at 0 % to Q 12 at 100 % (2.0 at the default 40 %). The knob is spread evenly in musical terms: each 10 % multiplies the Q by about 1.35.

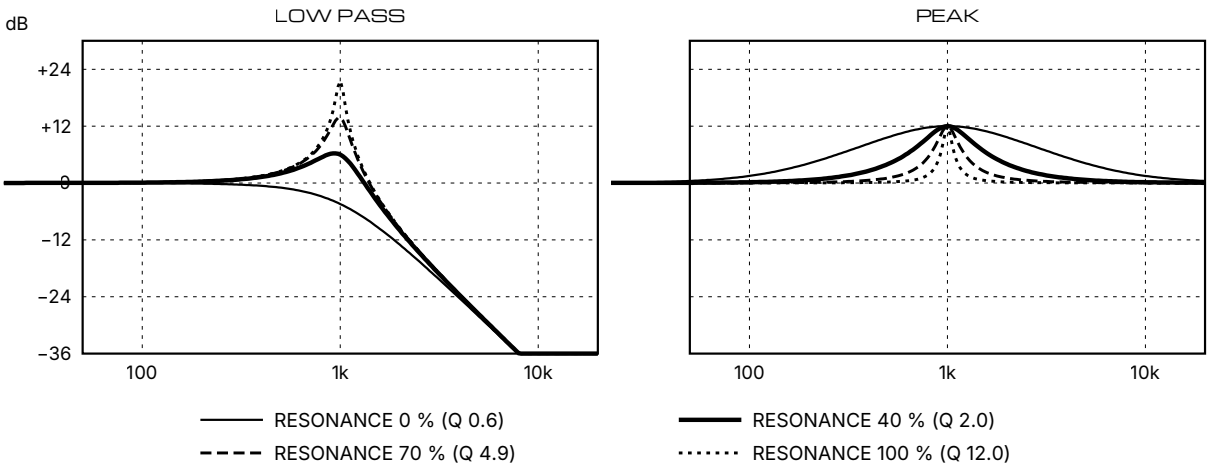


FIGURE 12 RESONANCE at 0, 40, 70 and 100 %, on a low pass and a peak at 1 kHz: the low pass grows a ringing bump at the cutoff, the peak narrows. Computed from the plug-in's own filter.

- **Low (0 to 30 %):** smooth, gentle slopes. The steps change the tone without drawing attention to the filter. Good on the mix bus and pads.
- **Middle (30 to 60 %):** a clear, vocal filter with a little edge at the cutoff: the classic setting for drums, guitars and keys.
- **High (60 to 100 %):** the filter rings and whistles at the cutoff, and every step sounds like a note: acid bass lines (*Acid Line*, 85 %), robotic chatter (*Robot Talk*, 90 %). Use it with care on full mixes.

On the low, high and band pass, more resonance means a peak at the cutoff; on the notch and the peak, a narrower band. CHAOS lowers the resonance of some steps (see *CHAOS*), so the knob sets the **sharpest** a step can be.

GLIDE

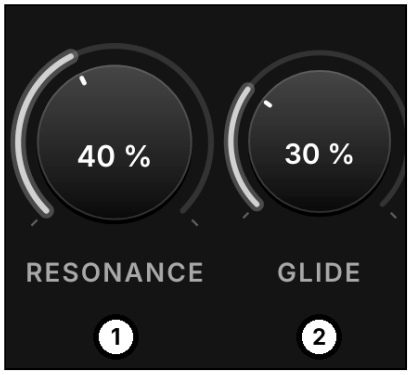


FIGURE 13 1 RESONANCE and 2 GLIDE.

Control	Range	Default	What it does
GLIDE	0 to 100 %, in 1 % steps	30 %	How much of each step the filter takes to move to the next setting.

GLIDE sets how the filter gets from one step's setting to the next. At each step, the filter starts moving to its new cutoff, Q and shape, and takes this share of the step to get there; then it holds until the next step. The move eases in and out, so it starts and lands gently.

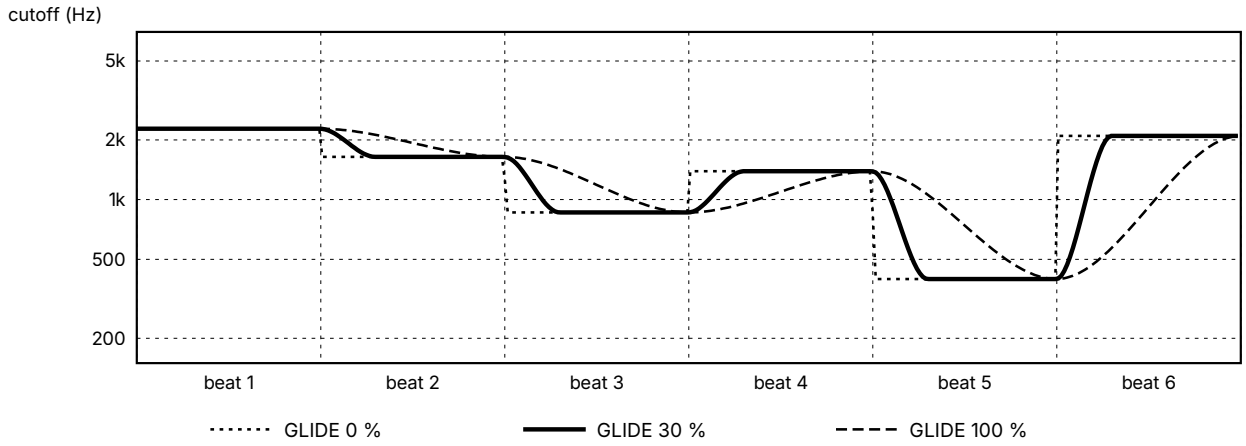


FIGURE 14 The cutoff over six beats (RATE 1/4 at 120 BPM, LP only, CHAOS 100 %) at GLIDE 0, 30 and 100 %, measured on the plug-in's engine. At 0 % the filter jumps; at 30 % it slides over the first 30 % of each beat, then holds; at 100 % it never stops moving.

- **0 %:** the filter **jumps** to each new setting. It still takes 3 ms to get there, so nothing clicks: the result is a hard, chopped, gated rhythm (*Break Mangler*, *Sixteenth Gate*, *Broken Radio*).
- **10 to 40 %:** a quick slide into each step, then a hold: rhythmic and clear, with a little "wah" at each change (*Beat Filter*, *Vocal Chop Filter*).
- **50 to 80 %:** a sweep that fills most of the step: smooth, liquid movement that still lands on the beat (*Bass Wobble*, *Room Motion*).
- **100 %:** the filter slides for the whole step, arriving just as the next one begins: a continuous sweep with no holds at all, an LFO that wanders (*Slow Open*, *Wandering Band*, *Tide*).

The glide's length is a share of the step, so it follows RATE and the tempo: 30 % of a beat at 120 BPM is 150 ms; 30 % of a sixteenth, 38 ms.

PATTERN, NEW and REPEAT

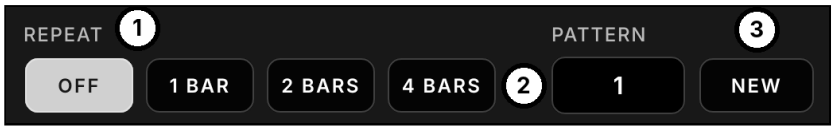


FIGURE 15 1 REPEAT (OFF lit), 2 the PATTERN number (1) and 3 NEW.

Control	Range	Default	What it does
PATTERN	1 to 999	1	Which pattern plays. Saved with your session and in presets.
NEW	push button		Picks a new pattern number at random (never the one you have).

Control	Range	Default	What it does
REPEAT	OFF, 1 BAR, 2 BARS, 4 BARS	OFF	Loops the pattern every 1, 2 or 4 bars.

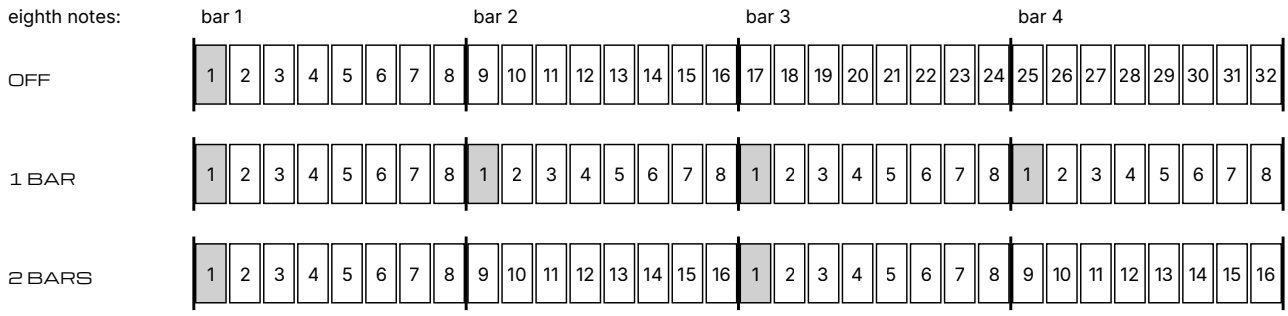
PATTERN and NEW

The PATTERN number is the seed the steps are drawn from: each number is a different pattern, with the same SHAPES, range, CHAOS and RESONANCE. Click NEW to hear another one; keep clicking until a pattern grooves with the part. The number shows in the window next to it. You can also set it from your DAW, or automate it, to switch patterns between sections of a song.

Because the pattern is a number, it's exact: a session reopened next year, or a preset you saved, plays the very same steps. Note the number of a pattern you like, or save a preset.

REPEAT

With REPEAT at OFF, every step of the song gets its own setting, from the first bar to the last: the pattern never repeats (and it's still the same on every playback). With 1 BAR, 2 BARS or 4 BARS, the pattern **loops**: the steps of the first bar (or two, or four) come back again and again, so the movement becomes a **riff** that the ear can follow.



Each cell is one step, numbered by the step of the pattern it plays (grey: the pattern's first step).
OFF never repeats (the numbers run on); 1 BAR plays steps 1 to 8 again every bar; 2 BARS, 1 to 16 every two bars.

FIGURE 16 Which step of the pattern plays on each eighth note (RATE 1/8) over four bars of 4/4, for REPEAT OFF, 1 BAR and 2 BARS. Computed from the plug-in's own pattern.

1 BAR is the tightest loop, best for rhythmic parts (*Beat Filter*, *Bass Wobble*, *Acid Line*); 2 BARS and 4 BARS give a longer phrase with a question and an answer (*Pad Motion*, *DJ Steps*). The loop always starts at the start of the song, so it lines up with your bars, and the STEPS lane marks where it starts again (see *Displays*). How the loop fits dotted and triplet values is covered in *Steps in time*.

MIX, OUTPUT and AUTO LEVEL

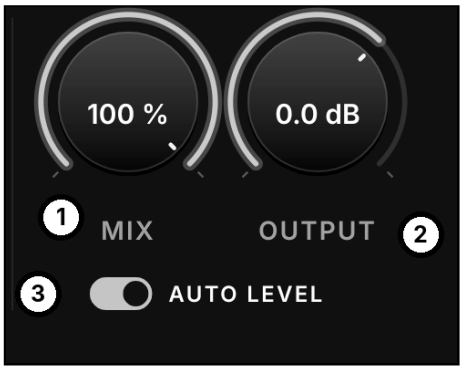


FIGURE 17 1 MIX, 2 OUTPUT and 3 the AUTO LEVEL switch (on).

Control	Range	Default	What it does
MIX	0 to 100 %, in 1 % steps	100 %	The filtered sound against the dry signal. 0 % is the dry signal only.
OUTPUT	−24 to +12 dB, in 0.1 dB steps	0.0 dB	The level going out, after the blend.
AUTO LEVEL	off, on	on	Gives every filter setting the gain that keeps the input's loudness.

AUTO LEVEL

A filter takes sound away: a band pass at 660 Hz turns a drum kit down by about 21 dB. Without help, a moving filter is mostly a moving **volume**: the dark and narrow steps drop out and the open ones jump forward. AUTO LEVEL fixes that.

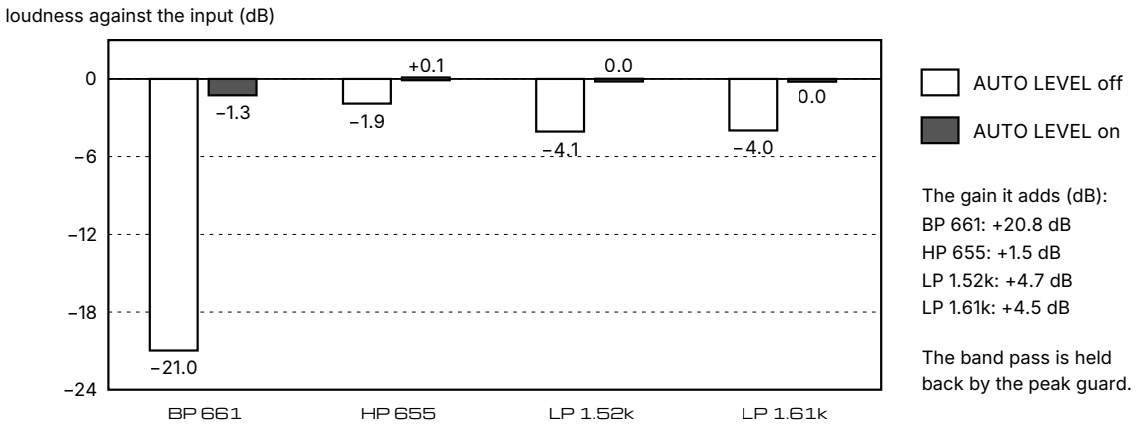


FIGURE 18 *Beat Filter*'s four settings, each held still on a drum kit: the loudness change with AUTO LEVEL off and on, and the gain AUTO LEVEL adds. Measured on the plug-in's engine.

How it works. The plug-in keeps listening to your track's **tone**: its spectrum, weighted the way a loudness meter hears, averaged over about two seconds of playing (it learns faster in the first second, and pauses in silence). For every filter setting, it works out how much of that spectrum the filter lets through, and adds back the difference, up to 24 dB either way. A band pass on a kit gets a lot back; a gentle low pass, which keeps most of the sound, very little; a PEAK, which adds, is turned down a little.

Why it doesn't pump. The gain follows the **filter**, not the signal: it moves when the filter moves (gliding with it), and holds while the filter holds. A loud hit doesn't duck it and a quiet passage doesn't raise it, so the dynamics of your track stay as they were. The MOTION display reads the gain as LEVEL (LEVEL +4.3 dB in the panel picture).

The peak guard. Bringing a thin sound back up can make its peaks jump: a high pass on a bass removes the fundamental, and the buzzing harmonics that are left have sharp peaks. So the gain AUTO LEVEL adds is never allowed to push the output more than **3 dB over the input's own recent peak**: it comes down at once when it would, and back over 150 ms. The band pass in the drawing is held back by the guard (−1.3 dB instead of 0), and a high or band pass on a bass comes out a little quieter by design.

What AUTO LEVEL holds is the **average** loudness of each setting on your track as a whole. A single hit can still come out louder or quieter than before, depending on what's in it: a hi-hat beat through a dark low pass is quieter, a kick through a high pass is quieter, because that hit has little of what the step keeps. That is the sound of a moving filter, and it's what you hear as the rhythm.

Switch AUTO LEVEL **off** when you want the level to move with the filter: for a filter used as a gate, a fade into a dark low pass, or when you set the level with your own automation. Then the band pass and high pass steps drop, sometimes by 20 dB, and you may want to raise OUTPUT.

MIX

MIX blends the filtered sound with the dry signal, sample for sample. Because the plug-in has no latency, the blend is exact: no phasing of its own.

Lower MIX to tuck the movement under the original: at 30 to 60 % the track keeps its body and punch, and the moving filter adds colour on top (*Hat Shimmer* 35 %, *Room Motion* 45 %, *Subtle Glue Motion* 35 %). MIX is also the control to automate for a build-up: from 0 % to 100 % over the last bars before a drop (see *Recipes*). At 0 % with OUTPUT at 0.0 dB, the output is the input, bit for bit.

OUTPUT

OUTPUT sets the level after everything else, from −24 to +12 dB. With AUTO LEVEL on, you rarely need it: the factory presets use it only to fine-tune by a dB or so, mostly where MIX blends the filtered and dry sounds. Use it to match bypass exactly, or to trim the track into your mix.

MIX and OUTPUT move smoothly when you turn or automate them.

Steps in time

Note values

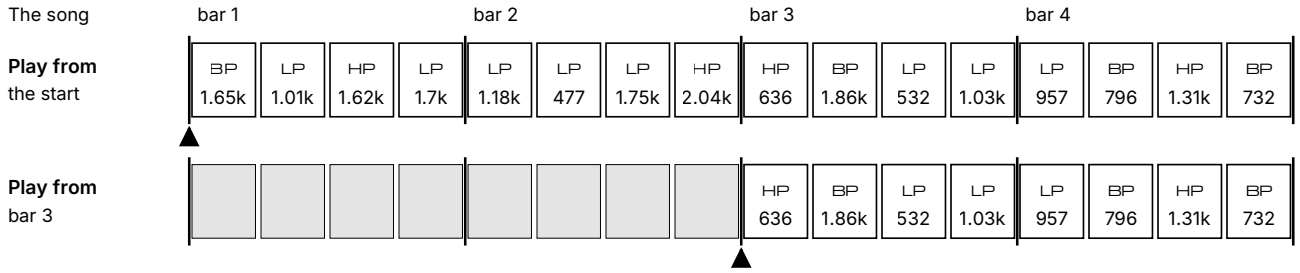
The steps follow your DAW's tempo: change the tempo and the steps change with it. The note values, with the length of a step at 120 BPM:

RATE	Step	At 120 BPM	Steps per bar (4/4)
1/32	⅛ beat	62.5 ms	32
1/16T	⅙ beat	83.3 ms	24
1/16	¼ beat	125 ms	16
1/8T	⅓ beat	167 ms	12
1/8	½ beat	250 ms	8
1/4T	⅔ beat	333 ms	6
1/8D	¾ beat	375 ms	5⅓
1/4	1 beat	500 ms	4
1/4D	1½ beats	750 ms	2⅔
1/2	2 beats	1 s	2
1/1	4 beats	2 s	1

A beat here is a quarter note. The knob runs in the order of the table, from the shortest step to the longest. The MOTION display shows the step's note value and the tempo, for example STEP 1/4 · 120 BPM.

The pattern follows the song

The plug-in counts steps from the start of the song (bar 1, beat 1). While the song plays, it reads the position from your DAW at every block, so the step that plays is always the step that belongs to that point of the song:



Init, RATE 1/4, REPEAT OFF. Whichever bar playback starts from, each beat gets the setting that belongs to it.

FIGURE 19 *Init* (RATE 1/4, REPEAT OFF) played from the start and from bar 3: bar 3 gets the same filters both times. Computed from the plug-in's own pattern.

- **Every playback is the same**, wherever you start it, and so is every bounce. Loop a section in your DAW and it loops with the same filters.
- **Tempo changes** are followed at once: the steps get longer or shorter with the tempo.
- **When the song is stopped**, the steps keep running at the song's tempo, so you can hear the effect while you tweak; they pick up the song's position again as soon as you press play. With no tempo from the host (for example in the standalone app), the steps run at 120 BPM.

REPEAT and the bar

REPEAT counts bars with your song's **time signature**: a bar of 4/4 is four beats, a bar of 3/4 three, a bar of 6/8 three (six eighth notes). The loop always starts again on the bar. With the straight and triplet values the bars hold a whole number of steps (at 1/8 in 4/4, 1 BAR is 8 steps; at 1/8T, 12). A **dotted** value doesn't divide a bar of 4/4 evenly, so the loop's last step is shorter: at 1/8D, 1 BAR is five steps and a third of one, then the pattern starts again on the next bar line. The STEPS lane shows where each loop starts again.

Displays

The MOTION display

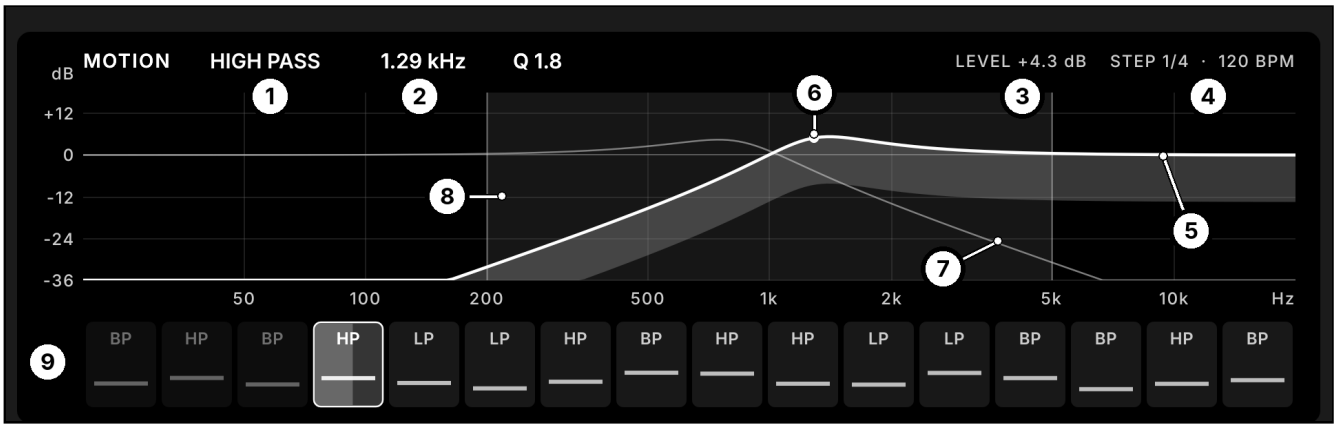


FIGURE 20 The MOTION display with *Init*: 1 the shape now, 2 its cutoff and Q, 3 AUTO LEVEL's gain, 4 the step and the tempo, 5 the filter now (blue on screen, the heavier line, with a band of light under it), 6 the cutoff, 7 the filter on the next step (grey, the thinner line), 8 the range set by LOW and HIGH (shaded), and 9 the STEPS lane.

The MOTION display draws the filter's response: how much each frequency is turned up or down, from 20 Hz on the left to 20 kHz on the right, and from +18 dB at the top to −36 dB at the bottom (the scale is marked every 12 dB on the left, the frequencies along the bottom).

- **The title line** reads, from the left: the **shape** the filter has now 1 (in blue, HIGH PASS), its **cutoff** and **Q** 2, and on the right, AUTO LEVEL's **gain** 3 (LEVEL +4.3 dB; shown only when AUTO LEVEL is on) and the **step** length with the **tempo** 4 (STEP 1/4 · 120 BPM).
- **The filter now** 5 is the heavy blue line, with a band of light under it, and a white dot on it at the **cutoff** 6. It moves as the filter glides. Without colour: the heavy line with the dot is now.
- **The next step** 7 is the thin grey line: where the filter will go when the next step starts.
- **The range** 8 between LOW and HIGH is shaded, with a thin line at each edge.
- **The STEPS lane** 9 runs along the bottom; see the next section.

The response drawn is the filter's own, before AUTO LEVEL's gain, so a band pass looks like a hill under 0 dB and a high pass like a slope up to 0 dB, even though AUTO LEVEL brings the sound back up.

During a glide the filter is between two shapes. The title then names the shape the filter is **closest** to, so for a moment it can show the old shape while the STEPS lane already shows the new one. Here are two of the other shape combinations, with the factory presets *Guitar* ▸ *Phase Steps* (NOTCH and PEAK, RATE 1/8, GLIDE 50 %) and *Rhythmic* ▸ *Sixteenth Gate* (all five shapes, RATE 1/16):

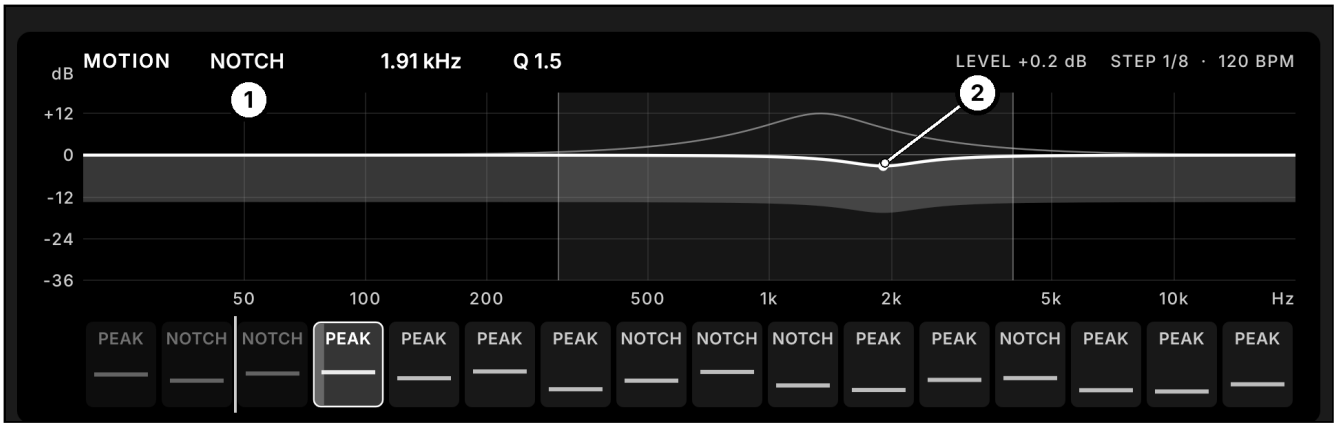


FIGURE 21 *Phase Steps*, caught in the middle of a glide: 1 the title still reads [NOTCH], the closest shape, while the filter 2 morphs from a notch towards the peak of the step now playing; the grey line shows the next step, another peak.

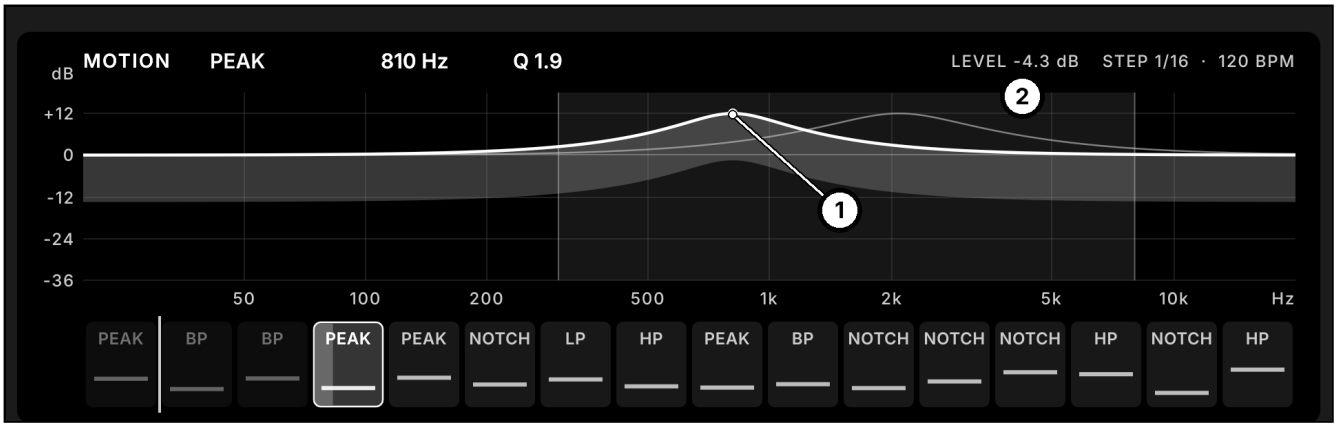


FIGURE 22 *Sixteenth Gate* on a [PEAK] step: 1 the 12 dB boost at the cutoff, and 2 [LEVEL -4.3 dB]: [AUTO LEVEL] turns a boost down, just as it brings a cut up. The STEPS lane shows all five shapes.

Hover over the display for a short explanation.

The STEPS lane

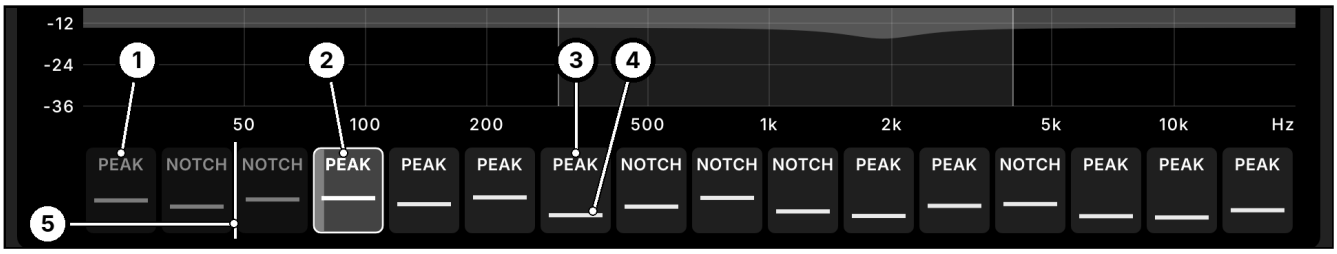


FIGURE 23 The STEPS lane with *Phase Steps*: 1 past steps (dimmer), 2 the step playing (outlined, filling from left to right), 3 a coming step's shape, 4 its cutoff, and 5 where the loop starts again ([REPEAT] [2 BARS]; orange on screen).

The STEPS lane shows the pattern around the step that's playing: **three steps back** (1), the **step playing** (2) and **twelve to come**, sixteen in all. It always shows the playing step in the fourth place, so the pattern scrolls through it from right to left.

- **Each step** shows its **shape** at the top (3) (LP, HP, BP, NOTCH or PEAK) and its **cutoff** as a short bar (4): the higher the bar, the brighter the step, from LOW at the bottom to HIGH at the top.
- **The step playing** is outlined and lit (blue on screen), and fills from left to right as it plays, like a progress bar. The past steps are dimmer than the ones to come.
- **With** REPEAT **on**, a vertical line (5) (orange on screen, a solid bar between two steps) marks where the loop starts again. With 1 BAR at 1/4 there's one every four steps; with REPEAT OFF, as in the panel picture, there are none.

What to look for: the lane is where you see a pattern before you hear it. When you click NEW, the lane changes at once: look for the mix of shapes and the up and down of the bars you want, then listen. Turn CHAOS and watch the bars spread out or gather in the middle.

Meter bridge (IN | OUT)

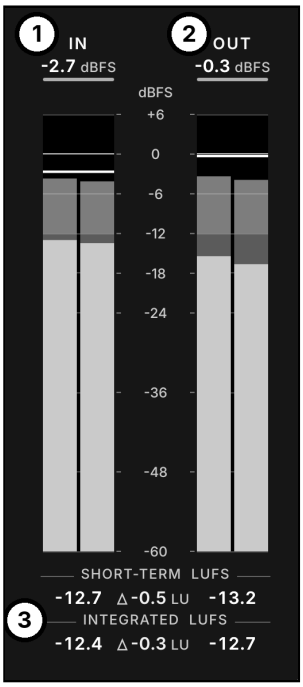


FIGURE 24 The meter bridge: (1) input and (2) output level, (3) short-term and integrated loudness with the OUT − IN difference.

VEIRA Motion Filter's meter bridge is the standard one, measured on the plug-in's input and output. With AUTO LEVEL on, the Δ readings sit close to 0 LU over a bar or two (−0.5 and −0.3 LU in the panel picture), the short-term one swinging a little with the steps. With it off, expect the output several dB under the input on band and high pass steps.

Reading the IN and OUT meters

The meter bridge measures what goes into VEIRA Motion Filter and what comes out, in level and in loudness. The drawing shows the input and output columns; any extra column on your plugin's bridge is described above.

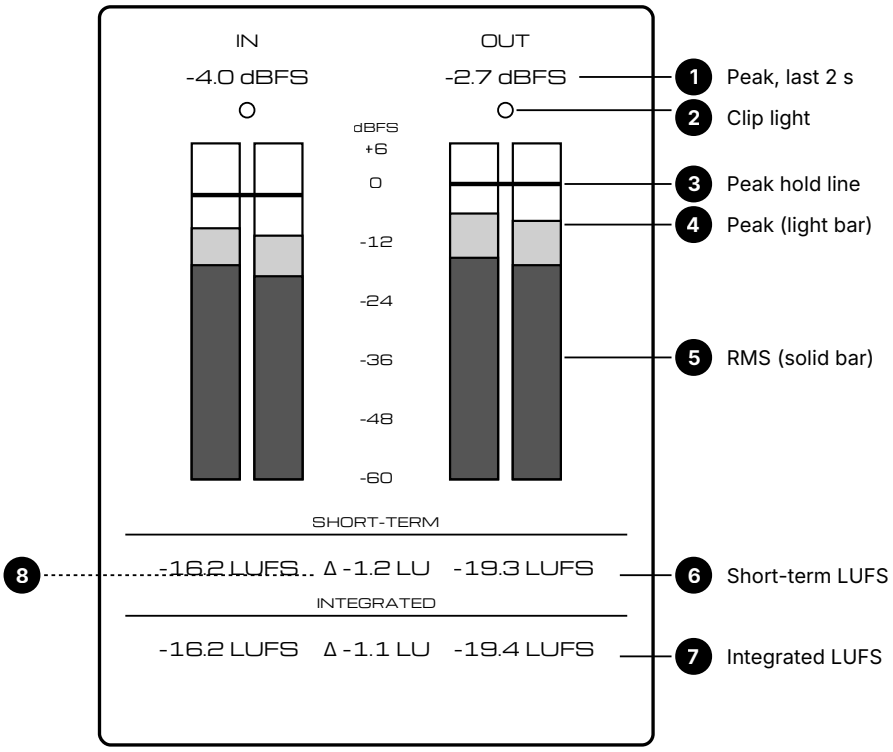


FIGURE 25 The meter bridge, left and right channel bars for input and output, with loudness below.

- 1 **Peak readout:** the highest sample peak of the last two seconds, in dBFS. It turns to a warning above 0 dBFS.
- 2 **Clip light:** lights on any sample at or over full scale. It stays lit until you click the meter.
- 3 **Hold line:** marks the recent peak on the bar.
- 4 **Peak bar** (the lighter part): the instantaneous sample peak of each channel.
- 5 **RMS bar** (the solid part): the average level over 300 ms, closer to how loud it sounds.
- 6 **SHORT-TERM:** loudness over the last 3 seconds, in LUFS, for the input (left) and the output (right).
- 7 **INTEGRATED:** loudness of everything since the measurement started, gated as the ITU-R BS.1770-4 and EBU R 128 standards require.
- 8 **Δ (delta):** OUT minus IN, in LU. It tells you how much louder (+) or quieter (−) VEIRA Motion Filter made the signal, so you can match levels fairly when you compare with bypass. It reads [--] while either side is too quiet to measure (below −70 LUFS).

The scale: on screen the bars are coloured like a studio console: green below −12 dBFS, yellow from −12 to −3, orange from −3 to 0 and red above 0 dBFS.

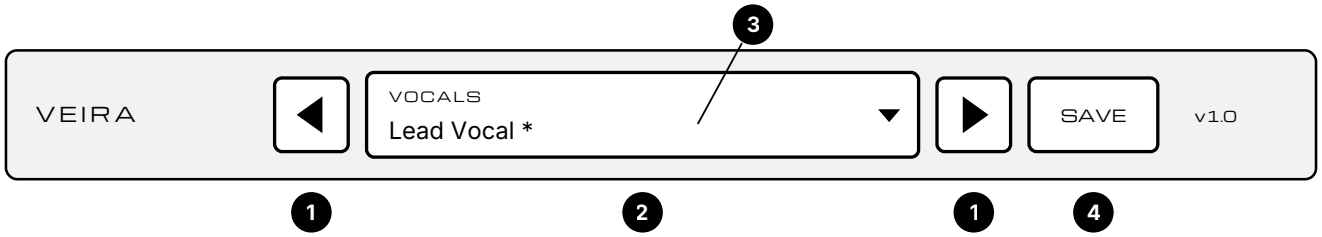
Clicks: click a level meter to reset its hold and clip light. Click the loudness readouts to restart the integrated measurement, for example at the start of a song.

Presets

VEIRA Motion Filter comes with **38 factory presets** in 10 folders. Each one is a starting point made for a real job. Load one close to what you need, then adjust the first control its note mentions.

The preset browser

The preset browser sits in the header, at the top of the window.



The header: logo and plugin name, then the preset browser, then the version.

FIGURE 26 The preset browser.

- 1 ◀ ▶ step to the previous or next preset, through every folder in order.
- 2 **The display** shows the folder (small, above) and the preset's name. Click it to open the preset menu. Hover over it to read the preset's note: what it's for and what to adjust first.
- 3 **An asterisk (*)** after the name means you've changed something since the preset loaded.
- 4 SAVE stores your current settings as a user preset.

The preset menu

Clicking the display opens a menu with:

- one submenu per **factory folder**, in the order shown below;
- **User Presets**, with your own presets in their folders;
- **Save...**, **Delete** (only for user presets: factory presets can't be deleted), **Rescan** (re-reads the user folder, if you copied presets in by hand) and **Show User Preset Folder** (opens it in Finder or Explorer).

Saving your own presets

1. Set VEIRA Motion Filter the way you like it.
2. Press SAVE. A dialog opens inside the plugin window.
3. Type a name, choose a folder or type a new folder name, and confirm.

Each user preset is one small .veirapreset file:

	Folder
macOS	~/Library/Audio/Presets/VEIRA/VEIRA Motion Filter/<Folder>/
Windows	%APPDATA%\VEIRA\VEIRA Motion Filter\Presets\<Folder>\

Copy these files to move your presets to another computer, or to back them up. Presets keep loading in future versions: any control added later simply starts at its default.

Presets in your DAW

The factory presets also appear in your DAW's own preset or program menu, named *Folder: Name* (for example *Vocals: Lead Vocal*). Whatever preset is selected is saved with your session and comes back when you reopen it, including the asterisk if you'd changed it.

The **Default ▸ Init** preset equals a fresh instance of the plugin: every control at its default.

The factory folders

Folder	Presets
Default	Init
Drums	Beat Filter, Hat Shimmer, Kick Pump Filter, Break Mangler, Room Motion
Bass	Bass Wobble, Funky Bass Steps, Sub Safe Motion, Acid Line
Guitar	Auto Wah Steps, Rhythm Sweeper, Phase Steps, Telephone Gate
Keyboards	Pad Motion, Synth Arp Filter, Organ Vowels, EP Shimmer
Vocals	Vocal Chop Filter, Radio Voice Steps, Breathing Air, Formant Dance
Mix Bus	Build Up Motion, Breakdown Filter, DJ Steps, Subtle Glue Motion
Rhythmic	Sixteenth Gate, Triplet Shuffle, Dotted Steps, Thirty Second Rush
Sweeps	Slow Open, Wandering Band, Phaser Drift, Tide
Creative FX	Robot Talk, Broken Radio, Chaos Machine, Underwater Steps

> **Levels.** The presets were measured at 120 BPM in 4/4 on a drum kit, a mix, a synth bass line, a strummed electric guitar and keys. With AUTO LEVEL on, every preset kept the input's loudness within 0.3 dB on the material it was made for, and within 2 dB on the others (a high or band pass on a bass comes out a little quieter, by design of the peak guard). Their peaks stay at most 6 dB over the input's. The steps follow the song's position, so a preset sounds the same on every playback.

Each preset is a full setting of every control, PATTERN included, and its note in the preset menu says what it's for and what to turn first. The folders:

- **Drums**, **Bass**, **Guitar**, **Keyboards** and **Vocals** are made for those sources: a beat filter, a hat shimmer and a pumping low pass for drums; a wobble, an acid line and notches that leave the low end alone for bass; wahs, sweeps and phases for guitar; pads, arpeggios and vowels for keys; chopped, radio and breathing effects for vocals.
- **Mix Bus** is for the whole mix or a group: a build-up, a breakdown, DJ-style filter moves and a subtle movement blended under the mix.
- **Rhythmic** puts the rhythm first: sixteenths, triplets, dotted eighths and thirty-seconds.

- **Sweeps** uses [GLIDE] 100 %: the filter never stops moving, from one long sweep per bar to a drifting phaser.
- **Creative FX** goes over the top: robotic chatter, a broken radio, total chaos and an underwater sound.

> **Tip:** Every preset has its own [PATTERN]. Once you've found a preset close to what you need, click [NEW] a few times to hear the same idea with other patterns, then save your favourite as a preset of your own.

Recipes

Step-by-step starting points. Make sure your DAW's tempo matches the song before you start: the steps follow it.

A beat filter on a drum loop

1. Insert VEIRA Motion Filter on the drum bus or a drum loop and load **Drums ▸ Beat Filter** ([RATE] [1/4], [LP] [HP] [BP], [REPEAT] [1 BAR]).
2. Press play: every beat has its own filter, and the bar repeats. Click [NEW] until the pattern grooves with the kit.
3. For a busier pattern, set [RATE] to [1/8]; for wilder steps, turn [CHAOS] up; for harder cuts, lower [GLIDE] towards 0 %.
4. To keep the kit's punch, lower [MIX] to 50 to 70 %.

A wobble bass

1. On a bass or synth bass track, load **Bass ▸ Bass Wobble** ([LP], [RATE] [1/8], 80 Hz to 1.2 kHz, [RESONANCE] 55 %, [GLIDE] 60 %).
2. Set [HIGH] for how bright the wobble opens, and [LOW] for how dark it closes.
3. For a faster, squelchier line, try **Acid Line** ([1/16], [RESONANCE] 85 %). To keep the sub steady while the bass moves, use **Sub Safe Motion** (moving notches above 250 Hz).

Rhythmic keys or a pad

1. On sustained chords or a pad, load **Keyboards ▸ Synth Arp Filter** ([LP] [BP], [RATE] [1/16], [REPEAT] [1 BAR]): the chords turn into a rhythmic, arpeggio-like part.
2. For slow movement instead, load **Pad Motion** ([LP], [RATE] [1/2], [GLIDE] 85 %): long sweeps that follow the phrase.
3. Turn [RESONANCE] up for a more vocal sound, down for a smoother one.

A build-up on the mix bus

1. On the mix bus or a music group, load **Mix Bus ▸ Build Up Motion** ([HP], [RATE] [1/4], 200 Hz to 9 kHz).
2. Set [MIX] to 0 % and automate it up to 100 % over the last 4 or 8 bars before the drop; at the drop, back to 0 %.
3. For an intro or a breakdown, **Breakdown Filter** does the opposite: a slow low pass. **DJ Steps** changes once a bar, like a DJ riding the filter.

Finding and keeping a pattern

1. Set [RATE], [SHAPES], the range and [CHAOS] for the job, and [REPEAT] to [1 BAR] or [2 BARS].
2. Loop a section of the song and click [NEW] while it plays. Watch the STEPS lane and listen for a pattern that sits with the groove.

3. When you have it, note the PATTERN number, or click SAVE in the preset browser to keep the whole setting. To use different patterns for the verse and the chorus, automate PATTERN.

Movement nobody notices

1. On the mix bus, a pad or a room mic, load **Mix Bus ▸ Subtle Glue Motion** (NOTCH PEAK, RESONANCE 15 %, MIX 35 %).
2. Toggle bypass: the sound feels a little more alive with it in, and nobody hears a filter.
3. On a drum room, **Drums ▸ Room Motion** does the same with slow sweeps; raise MIX for more.

Specifications

Type	Rhythmic filter: a filter whose shape, cutoff and resonance change on every step of the song, locked to the song's position
Channels	Mono and stereo (the same filter on both sides)
Latency	None. MIX 0 % with OUTPUT 0.0 dB: the output is the input, bit for bit
Filter	State-variable, 12 dB per octave; its outputs mixed into low pass, high pass, band pass, notch or peak (+12 dB); cutoff, Q and shape glide together
Level	AUTO LEVEL (default on): the gain that keeps the input's loudness through each filter setting (from the input's spectrum, K-weighted, averaged over about 2 s), within ±24 dB; a peak guard holds the output within 3 dB of the input's recent peak. Factory presets within 0.3 dB of the input's loudness on their main source
RATE	1/32, 1/16T, 1/16, 1/8T, 1/8, 1/4T, 1/8D, 1/4, 1/4D, 1/2, 1/1 (default 1/4), at the song's tempo; 120 BPM without a host tempo
CHAOS	0 to 100 % in 1 % steps (default 50 %): the cutoffs' spread around the middle of the range (log), and up to half of the resonance's travel taken away
LOW, HIGH	20 Hz to 2 kHz (default 200 Hz); 500 Hz to 20 kHz (default 5.00 kHz)
RESONANCE	0 to 100 % in 1 % steps (default 40 %): Q 0.6 to 12
GLIDE	0 to 100 % of a step in 1 % steps (default 30 %); at least 3 ms. Setting changes within a step glide over at least 20 ms
SHAPES	LP, HP, BP, NOTCH, PEAK, each on/off (default LP, HP, BP), chosen evenly
REPEAT	OFF, 1 BAR, 2 BARS, 4 BARS (default OFF), bars from the host's time signature
PATTERN	1 to 999 (default 1); NEW picks another at random
MIX, OUTPUT	0 to 100 % in 1 % steps (default 100 %), a linear blend with the dry signal; −24 to +12 dB in 0.1 dB steps (default 0.0 dB)
Displays	MOTION (the filter's response now and on the next step, 20 Hz to 20 kHz, +18 to −36 dB; shape, cutoff, Q, AUTO LEVEL gain, step and tempo); STEPS lane (16 steps: 3 past, the playing step, 12 to come; the loop's start with REPEAT)
Metering	IN and OUT meters (sample peak, RMS); short-term and integrated loudness per ITU-R BS.1770-4 / EBU R 128
Presets	38 factory presets in 10 folders, plus your own
Window	1240 × 680 points; resizable from 75 % to 200 %, saved with the session
Formats	VST3, Audio Units, standalone; AAX once signed
Plugin ID	Manufacturer Veir, plugin Vmfl

Troubleshooting and questions

The sound drops out for a moment every 30 seconds. The plugin isn't activated on this computer. Open VEIRA Manager and sign in; the strip at the bottom of the plugin's window says exactly what's wrong. See *Getting started ▸ Activation and the licence*.

I don't see VEIRA Motion Filter in my DAW. Make sure VEIRA Manager shows [SHOW] (installed) for it, then rescan plugins in your DAW. In Logic Pro, open the Plug-in Manager and choose *Reset & Rescan Selection* if needed. Look under the manufacturer **VEIRA**.

The steps don't land on the beat. The steps follow your DAW's tempo and position. Check that the project's tempo is the song's tempo (a recording made without a click, or an imported loop at another tempo, won't line up), and that the song starts at bar 1. The display's [STEP] line shows the tempo the plug-in receives.

The pattern is different every time I press play. It shouldn't be: while the song plays, each step comes from the song's position. When the transport is stopped, the steps run free at the song's tempo, and in the standalone app there is no song (the steps run at 120 BPM). If your DAW's transport isn't running (for example while you audition on a stopped track), the steps run free too.

The last step of the REPEAT loop is short. You're using a dotted [RATE] ([1/8D] or [1/4D]), which doesn't divide a bar of 4/4 evenly, so the loop's last step is cut short to start again on the bar. See *Steps in time ▸ REPEAT and the bar*. For steps of equal length, choose a straight or triplet value.

The level jumps around. Check that [AUTO LEVEL] is on. It needs a second or two of playing to learn your track's tone; after that the average holds. Single hits can still come out louder or quieter, because each step keeps different parts of the sound: that's the moving filter. For less contrast, lower [CHAOS], raise [GLIDE], or blend with [MIX].

A high or band pass on my bass sounds quieter. That's the peak guard: a bass with its fundamental filtered away has sharp peaks, so [AUTO LEVEL] stops bringing it up when its peaks reach 3 dB over the input's. Keep [LOW] lower, choose [LP] or [NOTCH], or raise [OUTPUT] a little.

The filter whistles or sounds harsh. That's [RESONANCE]: lower it, or raise [CHAOS], which softens some of the steps. A [PEAK] at a high cutoff with high resonance can sound harsh on a bright mix: lower [HIGH] or switch [PEAK] off.

It clicks. It shouldn't: even at [GLIDE] 0 % each change takes 3 ms. Very fast steps ([1/32]) with [GLIDE] 0 % on low notes can sound like a buzz, because the filter changes 16 times a second at 120 BPM: that's the effect. Raise [GLIDE] a little for a softer edge.

I want the same pattern in another session. Note the [PATTERN] number, or save a preset: with the same settings and the same number, the steps are identical.

The window is too small (or too big). Drag its bottom-right corner: 75 % to 200 %, saved with your session.

Do my sessions keep my settings? Yes. Every control, the [PATTERN] number, the selected preset and the window size are saved with your session, and every control can be automated.

Contact: support@veiraaudio.com. Mention your computer (Mac or Windows and its version), your DAW and version, and what you see.



VEIRA Motion Filter · User Manual · Version 0.2.0

Support: **support@veiraaudio.com** · Web: **veiraaudio.com**

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