# Love Beams Manual

A cosmic echo unit, designed for exploratory psychonauts and interplanetary funkateers.



SPECIFICATIONS
<u>I/O</u> : Mono (TS unbalanced 6.4mm jack).
<u>Power</u> : 9V DC power supply, standard 2.1mm
(negative tip/positive sleeve) - not included.
<u>Current</u> : 85mA

# Global Ctrls

VOL - IMPORTANT: There is a significant amount of gain available on the VOL control (more than x10). Depending on your input source and signal chain you should adjust accordingly. On more recent builds 'unity gain' is fully counterclockwise on the VOL knob - for earlier builds it was around 8 or 9 o'clock. Above that point you move through clean boost all the way into a nicely compressed, heavily saturated op-amp distortion - use with caution.

**MIX** – Blends between dry and effected signals. Fully counter clockwise (CCW) is 100% dry, 12 o'clock is a 50/50 blend and fully Clockwise (CW) is 100% wet.

**TONE** – Sweepable tone control. From a dark, low pass filter (fully CCW) to a bright, high pass filter (fully CW). There will be a slight volume boost as the knob approaches either end of its range. Frequency response will be at its flatest somewhere between 11 and 12 o'clock.

## Parameter Ctrls

These are general descriptions of the parameter ctrls, they may control more than what is specified here. See Modes below for a more detailed description.

**TIME** – Controls delay time for D1-D4, modulation rate for F1-F2 and the pre-delay/delay time for ?-??.

FEED - Feedback control (amount of repeats fed from the effect output back to the effect input) for D1-D4 and ?-??. Modulation depth for F1-F2. Note: Several modes will self-oscillate at high settings, use with caution.

**LOVE** - Mode specific control - see modes below.

# Modes

## DELAY 1 - LIGHTWAVES

A uniquely modulated band pass filter, into a delay (max 1000msec) with an overdriven chorus in the feedback path that goes from a subtle radiance to deep, swelling pulsations.

**TIME** – Delay time, filter cutoff modulation rate and chorus rate Note: chorus rate is inverse to filter cutoff modulation rate.

FEED - Delay feedback amount

LOVE - Modulation depth and filter resonance

## DELAY 2 - LIFE SPEED

A low pass filter modulated by a sample and hold control signal, into a delay (max 850msec) with VCA (tremolo) modulation in the feedback path. Capable of bending and shifting the repeats into anything from rich textures to hypnotic rhythmic echoes.

**TIME** – Delay time and tremolo rate Note: the tremolo rate control is inverse to delay time. This creates an interesting polyrhythmic effect at different delay times and makes this ctrl highly interactive with the **LOVE** ctrl.

FEED - Delay feedback amount and S/H rate
Note: S/H modulation of the filter cutoff is quite subtle.

**LOVE** – Tremolo depth and S/H modulation depth

#### DELAY 3 - SUBTERRANEAN

A delay (max 1000msec) into an envelope-controlled filter with a blendable octave fuzz in the feedback path. Creating trippy, accented repeats, with higher frequencies spiking then decaying rapidly.

**TIME** – Delay time from 1-1000msec

**FEED** – Delay feedback amount and oct fuzz blend (fully CW for maximum fuzz)

**LOVE** - Envelope sensitivity

Note: this control is highly interactive with the input level of your signal. Sending a highly dynamic signal (eg. drum machine pattern or accented guitar/synth part) may yield interesting results.

#### DELAY 4 - SOUND + VISION

A delay (max 1000msec) with cascading, pitch-shifted repeats. Depending on where you set the **LOVE** ctrl the pitch is either an octave below, a 5th above or a blend between the two. Depending on the ctrls, the repeats are uniquely filtered to allow for everything from subtle harmonic overtones, to kaleidoscopic, mutant echoes.

**TIME** – Delay time from 1-1000msec

FEED - Delay feedback and resonance amount

**LOVE** - Blend between pitch shifted repeats. Fully CCW is an Oct below, fully CW is a 5th above and 12 o'clock is a 50/50 blend

#### FILTER 1 - HONEY

A low pass filter with the option for light to heavy modulation. Capable of subtle pulses, swelling ambiance or transparent radiation... Note: The global **BLEND** control is very useful for shaping the sound of the filter modes. Be sure to utilise it...

**TIME** - Chorus rate/blend Note: Chorus is more subtle when knob is fully CCW. Turn knob CW to simultaneously blend in the chorus and increase it's modulation rate.

FEED - Chorus depth and filter resonance

**LOVE** - Low pass filter cutoff frequency

#### FILTER 2 - PATCHWORK

A low pass filter with blendable fuzz and a unique (modulating square wave) tremolo effect. A dreamweapon capable of stretching minds wide open… use thoughtfully.

Note: The global **BLEND** control is very useful for shaping the sound of the filter modes. Be sure to utilise it...

**TIME** - Tremolo rate

**FEED** - Filter resonance and oct fuzz blend (fully CW for maximum fuzz)

**LOVE** - Low pass filter cutoff frequency

#### ? - RESHAPE

A resonant, plate-like reverb into a filtered delay line. Plays with the fabric of time in a very pleasant way.

**TIME** – Delay time : note that at short settings Reshape can sound like a nice modulated spring reverb

FEED - Delay feedback amount

**LOVE** – Tone and resonance control of reverb. Fully CCW is a dark filtered reverb, rotating CW will brighten reverb, introducing high frequencies and sweeping out the low.

### ?? - Creation Rebel

A resonant, spring-like reverb with a classic 4 stage phaser in the output path. Inspired by the sound of one of the UK's greatest record labels - **On-U U U U U U U U u u**.

**TIME** - Rate control for the phaser

**FEED** – Decay control for reverb, capable of self oscillation at high settings.

**LOVE** – Depth control for the phaser, as depth is increased a high pass filter is also introduced, sweeping out the low end.