

ALM-008

'Pip Slope'

- Operation Manual -
(V0.2)



Introduction3
Technical Specifications 3

Core Operation4
Panel Layout 4
General Usage 5

REV 005 Improvements.....6

Limited Warranty7

Support8

Introduction

'Pip Slope' is an envelope generator. It supports both Attack/Decay and Attack/Sustain/Decay type functions with both direct and voltage control of Attack and Decay times. Envelopes can be automatically looped and the function curve type changed between exponential and linear.

Feature list;

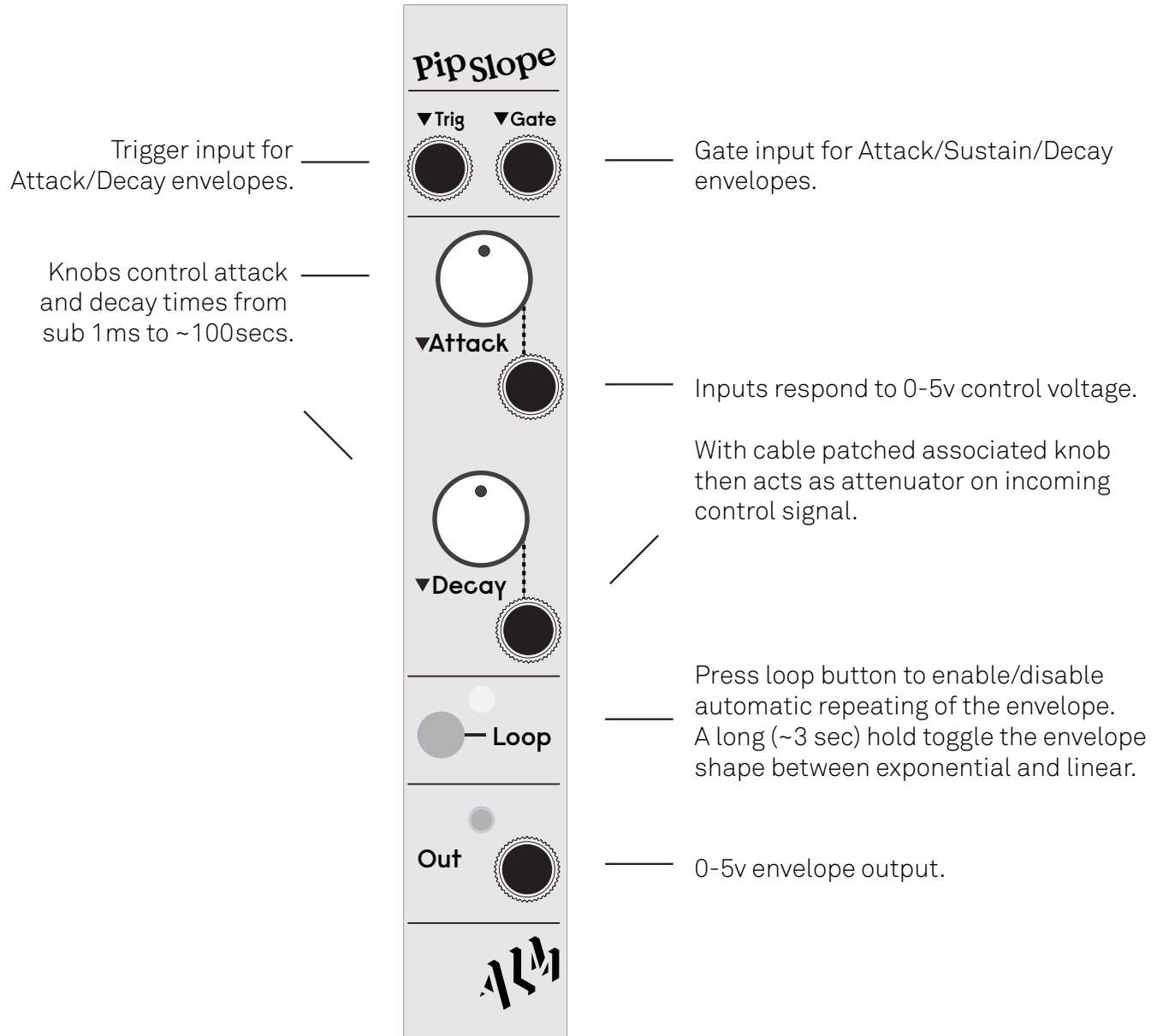
- Compact function generator in 4HP.
- Voltage control of attack and release times.
- Super snappy attack times - sub 1ms to 100s+ range.
- Optional self looping ability.
- Exponential and linear curves.
- State saved across power cycles.
- Reverse polarity protection.
- Skiff friendly.
- Designed and Made in the UK.

Technical Specifications

- Supply: +/-12V
- Current Draw: ~50ma
- Size: 4 HP
- Depth: 32mm (including power header)

Core Operation

Panel Layout



General Usage

A trigger or gate signal is patched into the top inputs of the module as to produce an envelope (between 0 and $\sim +5\text{v}$) at the output. The red LED indicates the output level. A trigger input will produce an envelope that rises to $\sim 5\text{v}$ and then instantly falls. A gate input will rise and then stay high at $\sim 5\text{v}$ whilst the gate is high before falling. Note the attack (rising) phase is always completed - even if the gate finishes first.

The attack and decay times of the output envelope can be adjusted with the 2 relevant control knobs. Fully CW gives times of approx. 100 seconds whilst fully CCW gives approx. sub 1ms times. The times can be further controlled by control signals (0-5v response). With a control signal patched the control knobs become attenuation controls on the input signal. They are not offsets.

The loop button provides toggling of automatic triggering and repeating (i.e looping) of the envelope. The yellow LED indicates looping mode is enabled. A long (approx. 3 sec) hold of the loop button will toggle the envelope curve from exponential to linear (and vice versa). The button release is then ignored (loop mode wont toggle).

The loop mode and curve type are retained across power cycles.

REV 005 Improvements

Pip Slopes's dating from late 2016 with 'Rev005' printed on the back of the PCB have the following improvements over the original model:

- Fixes to gate handling. A gate release before the end of an attack cycle will now move instantly to the release stage rather than completing the attack cycle.
- Extra 'logarithmic' envelope curve output
- Loop LED now flashes to indicate an envelope curve type change. 1 flash indicates exponential, 2 linear and 3 logarithmic.
- Slight improvement to envelope output resolution.

Limited Warranty

From the date of manufacture this device is guaranteed for a period of 2 years against any manufacturing or material defects. Any such defects will be repaired or replaced at the discretion of ALM. This does not apply to;

- Physical damage arising from mistreating (i.e. dropping, submerging etc).
- Damage caused by incorrect power connections.
- Overexposure to heat or direct sunlight.
- Damage caused by inappropriate or mis-use.
- Use of incorrect or non official firmware

No responsibility is implied or accepted for harm to person or apparatus caused through operation of this product.

By using this product you agree to these terms.

Support

For the latest news, additional info, downloads and firmware updates please visit the ALM website at <http://busycircuits.com> and follow @busycircuits on twitter.

Please send any questions or comments to info@busycircuits.com

