# DS80

### ds80

**ds80** is a Logue multi-engine oscillator which emulates the digital waveform generation from the vintage Digisound DS-80-21 VCDO rack module.

Key features:

• 32 waveforms in 4+1 banks
• reproduces variable-sample-rate waveform artefacts
• alias-free re-synthesis engine
• single oscillators plus white noise
• waveforms can be selected individually or swept smoothly as a wavetable
• bandwidth limiter function
• analogue tuning drift emulation

**ds80** is based on the *viper* synth engine which uses additive synthesis generate high quality waveform output without aliasing.

For information of the DS-80-21 VDCO see http://www.digisound80.co.uk/digisound/modules/80-21.htm.

## Parameters and Controls

Use the *Shape* control select the waveform within the bank. If the *Step* parameter is 1, the individual waveforms are selected. If the *Step* parameter is greater than one, the wave shape changes smoothly as the shape is adjusted.

Use *Shift-Shape* to mix between the oscillator and the white noise generator.

| Parameter | Range | Function |
|---|---|---|
| Bank | 1 – 5 | Selects the waveform bank.<br>1 => the first bank of 8 waveforms<br>2 => the second bank of 8 waveforms<br>2 => the third bank of 8 waveforms<br>3 => the fourth bank of 8 waveforms<br>5 => an additional bank containing all 32 waveforms in sequence |
| Step | 1 – 10 | If set larger than 1, allows progressively smoother interpolation between waveforms. |
| Pitch | -100 – 100 | Sets the pitch of oscillator 1, over a range from 1 octave below to 1 octave above. The adjustment is non-linear, providing finer control over detuned around zero.<br><br>Be aware that the Logue software may default the pitch value to -100, resulting in sounds an octave lower than might be expected. |
| Bandwidth | 1 – 16 | Controls the oscillator bandwidth. Values greater than one gradually reduce the number of high frequency components. |
| Drift | 0 – 100% | Sets the amount of analogue drift. Each voice will drift independently. |
| FEG Gain | 0 – 100% | Sets the Filter EG modulation gain. If non-zero, the filter envelope is used to modulate the shape, allowing automated sweeps between waveforms.<br><br>*(Prologue and Minilogue-XD only)* |

## Downloading and Feedback
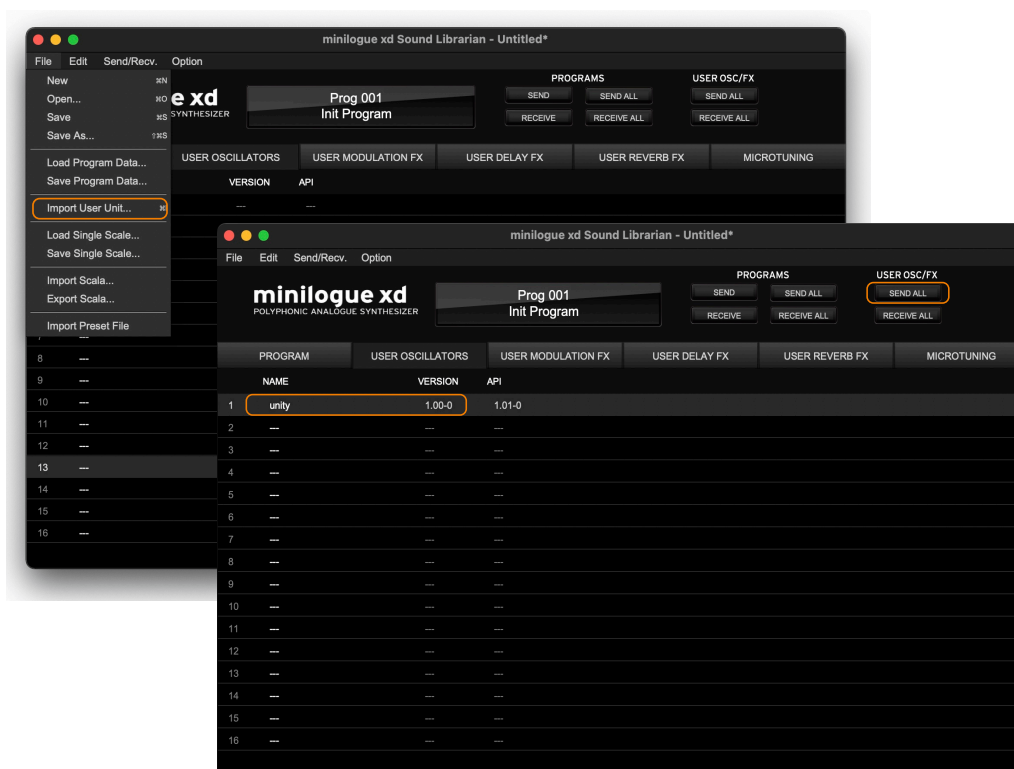
Information and updates can be found at **https://tsoniq.com/software/korg/viper**.

You can send feedback by email to **logue@tsoniq.com**, or leave a comment on the download page.

## Installation

*ds80* is supplied as a zip archive containing three units:

|  |  |
|---|---|
| ds80.prlgunit | Prologue 8 and 16 |
| ds80.mnlgxdunit | Minilogue XD |
| ds80.ntkdigunit | NTS-1 |

Use the appropriate Librarian application (available from **https://korg.com**) to send the appropriate unit to the synthesiser.

## Requirements

*ds80* requires a Korg NTS-1, Minilogue XD, Prologue 8 or Prologue 16.

Installation requires the use of a PC or macOS computer and the Korg Librarian software appropriate for the synthesiser.

## Copyright, Warranty and Liabilities

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No warranty is implied. Any liability resulting from the use of this software is limited to the purchase price.

### Release History

| Version | Release Date | Changes |
| --- | --- | --- |
| 1.0 | 21-Dec-2023 | Initial release. |
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