

New VST3 Plug-in Set

Nuendo 4 includes a brand-new set of great-sounding VST3 effects plug-ins that offer new VST3 functions such as side chaining, or the ability to stop the plug-in processing when no audio signal is present. VST3 plug-ins are also fully surround-compatible, with a single instance providing processing on up to 12 channels. The new effect plug-ins in Nuendo 4 constitute Steinberg's most complete plug-in set ever. They come with more than 800 great-sounding presets, which allow you to experience the excellent quality of these effects from the first moment on. Here is a complete overview of all the great VST 3 plug-ins that come with Nuendo 4:

Delay	MonoDelay	Monophonic delay processor with filter stage and tempo sync. The Steve Reich of delays.
	StereoDelay	Dual-channel delay with separate and independent left and right delay stages. Features variable filters and tempo sync for each channel.
	PingPongDelay	A mono delay with automatic L/R bounce for the classic ping-pong delay effect. Also features a filter stage and tempo sync.
	ModMachine	A powerful multi-stage delay/modulation effect (see diagram for signal flow). Combines a wide-range delay with LFO controlled delay time, as well as a resonant filter with dual LFOs for frequency and resonance modulation. The filter can either be inserted into the output stage or into a delay feedback loop. A "Spatial" parameter controls the modulation offset between channels.
Distortion	ToneBooster	Simple volume booster with a variable filter stage for tone control. Simulates classic stomp boxes like Range Booster. Very useful in combination with AmpSimulator to adjust output volume from low-level output instruments.
	Distortion	Simple distortion effect with Drive, Feedback, and Tone controls.
	AmpSimulator	Guitar amp simulation with speaker simulation. Features various amp and cabinet models to chose from. Additional controls resemble a classic guitar combo. Also suitable for bass. May be used in combination with the "ToneBooster" if the guitar lacks output gain.
	SoftClipper	Soft clipping with independent 2nd and 3rd harmonics controls.
Dynamics	Compressor	Classic compressor with auto release, auto make-up gain, hard/soft knee, RMS/Peak, and "Live" mode which disables look-ahead for low latency use.
	Expander	Classic expander; also features auto-release and "Live" mode for low latency use.
	Limiter	Straight-forward low-distortion limiter with auto-release; puts a "hard ceiling" on any signal. Also suitable for the master stage.
	Gate	Flexible gate with independent attack and release controls, auto-release, a sidechain input filter for ducking effects, as well as a "live" mode for low-latency use.
	Maximizer	Hard limiter/loudness enhancer for master channel; features soft clipping and automatic attack/release.
	EnvelopeShaper	Envelope Shaper. Manipulates the transients of ideally percussive input signals; offers variable attack gain and length, as well as release gain controls.
	VSTDynamics	This is the VST3 version of the classic VST Dynamics multi-effect plug-in. Combines Compressor, Gate, Limiter and Soft Clipper with flexible routing capabilities.
	VintageCompressor	Modelled after one of the most famous vintage compressors. Easy to use but very effective.
	MultibandCompressor	The new Multi-Band Compressor features four independent bands with three crossover-frequencies. Each band has its own independent compressor (with Threshold, Ratio, Attack, Release und Makeup Gain); it features independent Solo and Bypass per band, and auto mode for automatic attack/release control. Each compressor band has an independent automatic make-up gain.
EQ	StudioEQ	This powerful and versatile equalizer offers full four-band parametric control with variable response curves and shelving modes, as well as analogue-style peak filters. The new EQ types are also available in Nuendo 4's new channel EQ.

	GEQ10	Graphic Equalizer with 10 bands; features drawing of EQ curves, an invert parameter, and seven different response types. Also features a global range control for overall amount of equalization.
	GEQ30	Graphic Equalizer with 30 bands; features drawing of EQ curves, an invert parameter, and seven different response types. Also features a global range control for overall amount of equalization.
Filter	WahWah	Typical wah-wah pedal modelling effect - lets you emulate your favourite wah-wah pedals. Features parameters for frequency-range, filter-width, and gain range.
	DualFilter	This unique effect combines low-pass and high-pass filters with single Cutoff and Resonance controls. Great for DJ-style filter effects.
	Post Filter	This filter has been specifically designed to remove unwanted noise such as rumble, high-frequency noise or specific interference signals such as 60 Hz hum and high frequency tones created by screens or hard drives. The included notch filter is extremely steep and makes additional harmonic notches available if needed.
Modulation	StudioChorus	Powerful dual-stage chorus with two identical stages running in serial; each stage also features a filter stage and a spatial parameter which creates modulation offsets between channels, also in surround configurations.
	Chorus	This single-stage Chorus is identical to the StudioChorus, but with a single modulation stage only.
	Flanger	Powerful flanger with editable Lo/Hi Range, a filter stage, manual mode and a "spacial" parameter for multi-channel modulation offsets.
	Phaser	Classic phaser with variable filter stage, manual mode, tempo sync and a "spatial" parameter for multi-channel modulation offsets.
	Tremolo	Classic tremolo effect with optional tempo sync and a "spatial" parameter to add multichannel modulation offsets.
	Vibrato	Classic vibrato effect with optional tempo sync and a "spatial" parameter to add multichannel modulation offsets.
	AutoPan	Automatic panning effect with adjustable width, rate, two waveshapes; features tempo sync.
	Cloner	The Cloner simulates the effect of double-tracking by creating up to four "cloned" signals from the original input source. Cloned signals have variable delay, detune and panning. Very useful - not only for creating thick backing vocal performances from single tracks.
	Rotary	Rotor speaker cabinet effect with very powerful editing capabilities. Features independent Lo/Hi cabinet control, overdrive, slow/fast/stop modes.
Spacial	MonoToStereo	Can create a pseudo-stereo signal from any mono source. Also includes controls for "colour" and "delay".
	StereoEnhancer	Can enhance the stereo width of a stereo input signal. Features controls for "color" and "delay" to further enhance the effect.
Reverb	Roomworks	Steinberg's professional DSP reverb is now ported to VST3. While delivering excellent room simulation effects, it's CPU-efficient and easy to use. When used in a surround configuration, Roomworks turns into a true surround effect offering expert controls for Distance and Balance.
	Roomworks SE	A new "light" version of Steinberg's appraised Roomworks reverb. Great sound – low on CPU load.
Other	Octaver	Sub-octave pitch shifter creates two additional signals, one and two octaves below the input signal, each with variable level.
	UV 22 HR	The Apogee UV22HR dithering plug-ins is back as a VST3 plug-in, thereby being available on all system platforms (including Intel Mac and Vista64)
	Tuner	Instrument tuner plug-in.

Additional 57 plug-ins

In addition to the 38 new VST 3 plug-ins, a selection of VST 2 plug-ins are also installed with Nuendo 4, running in the Nuendo 4 environment side-by-side with the new VST3 plug-ins. Nuendo 4 features a VST plug-in bridge and smoothly integrates Mac PPC plug-ins as well as VST 2 plug-ins into the new Nuendo generation which provides the latest MacIntel and VST 3 technologies:

- SMPTE Generator
- MultiScope
- Mix6to2
- Mix8to2
- MixConvert
- SPL DeEsser
- DeClicker
- DeNoiser
- MatrixDecoder
- MatrixEncoder
- SurroundDither
- MixerDelay
- TestGenerator
- SurroundPan
- Metalizer
- RingModulator
- Chopper
- Bitcrusher
- Grungelizer
- Tonic
- Q
- NuendoEQ2
- MIDI Gate
- DaTube
- StepFilter
- Tranceformer
- VSTDynamics

And just in case that should not be enough to create any desired sound on the planet, Nuendo 4 contains a list of MIDI plug-ins allowing real-time manipulation of incoming MIDI data to create arpeggios, chords, echoes and compression to name but a few things that these plug-in can achieve:

- Arpache 5
- Arpache SX
- Autopan
- Chorder
- Compress
- Control
- Context Gate
- Density
- MicroTuner
- MidiControl
- MidiEcho
- Note 2 CC
- Quantizer
- StepDesigner
- Track Control
- Track FX
- Transformer

To grant maximum backwards compatibility with older Nuendo versions and projects generated on these, the Nuendo 4 DVD contains a selection of popular plug-ins from the past. All of these have meanwhile been updated by newer and more sophisticated ones but it is assuring to know that these can still be made available from the DVD for restoring older projects.

- DoubleDelay
- ModDelay
- Overdrive
- QuadraFuzz
- Dynamics
- Magneto
- MultibandCompressor
- Chorus
- Flanger
- Rotary
- Phaser
- Symphonic
- Vocoder
- Reverb A
- Reverb B
- VB1
- LM-7