HX-20

Soundbank Manual

Software Version 1.0

EN231206

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HX-20

Introduction

HX-20
Iconic Semi-Modular Analog Synth

A NEW AND INSPIRING LOOK AT AN ESTEEMED VINTAGE GEM

An Analog Icon

HX-20 is based on one of the most recognizable and well-loved analog monosynths around, known for its versatile semi-modular architecture, iconic front panel design, and starred musical history. Launched in the late '70s, this small two-oscillator monosynth has a lot to offer, and continues to be an inspirational studio compadre for artists around the world.

More Than The Sum

The success of this synth wasn't due to any single design consideration, instead it benefits from its combination of great features, fantastic sound, and compelling value. From the rich analog oscillators to its versatile filter section, to being both semi-modular - capable of integrating with external inputs and larger systems, to being relatively light and portable, there is simply a lot to love.

A Dynamic Duo

The HX-20 is the debut release of UVI's new HX Series - leveraging our deep history in hardware sampling and physical modeling to create flexible, modern instruments with an unmistakable hardware soul, thanks in part to a novel hybrid approach combining hardware samples and wavetables, with physically-modeled filters. With its own unique hybrid sensibilities, we thought this was the perfect instrument to kick things off with.

Hybrid-X Engine

HX-20 is similar to many of our vintage instruments in that you get a deep sampling of the hardware, but it excels in two important ways; the addition of two new layers of hardware-based wavetables, and physically-modeled filters - giving you three sample layers in total to configure, all with the analog charm you know and love. Like our chosen hardware, this unique combination of features creates a powerful and compelling sonic tool with incredible character.

Hardware Sound, Exemplified

The new sample-based wavetable oscillators in HX-20 give you entirely new dimensions with which to explore. Capturing the hardware in its full range, you have greater flexibility and nuance over the raw instrument sound than ever before. The best part, you still get our top-tier sample layers, with hand-crafted sounds lovingly designed here at UVI.

Inspiring Presets

Classic, Arpeggiated, Bass, BrassSynth, Lead, Keyboard, Pad, Pluck, FX & Rhythmic, Sequenced, in the end you get access to 222 presets. Assembled from a library of 13000+ hardware samples, arranged into 180+ layers, HX-20 sounds alive with analog soul, offering a wide range of useful and inspiring patches. The multi-layer architecture means you can create stacks and modulation with ease, opening the door to countless possibilities.

Creative Architecture

HX-20 provides a powerful and versatile toolset for both customizing existing patches, and creating your own. 2 hardware-based wavetable oscillators and a sample-based oscillator feed a pair of analog-modeled filters, all with ADSR envelopes and numerous, easy to configure modulation points. A powerful arpeggiator/phaser with plenty of presets allows you to create rich sequences, and a featured array of both macro and studio effects is available for everything from deep sonic manipulation to fine surgical shaping.

An iconic analog monosynth reimagined with the very best of our hardware sampling know-how and DSP magic, HX-20 delivers a new and inspiring look at an esteemed vintage gem.

HX Series Instruments

HX-20 is the first of UVI's new HX Series of instruments, offering an unparalleled hardware sound thanks to a triple threat of sample-based oscillators combined with physically-modeled filters.

Minimum System Requirements

- Latest version of UVI Workstation or Falcon
- 3.9GB of disk space

For more information on the installation process, please refer to the document: Install Guide

HX-20

User Interface - Main

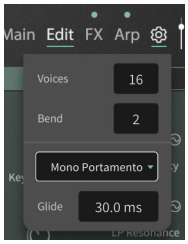
1 Preset Menus

» **Presets** - Change presets with drop-down menu or by using the [<] [>] buttons
» **Options** ☰ - Click to access the commands by drop-down menu
Load - To load a user preset
Save - To save a new preset

2 Pages

Change current page: Main, Edit, FX and Arp
» **Global FX/ARP On-Off** - Click the dot above FX and ARP label to enable/disable the section globally

3 Settings ⚙



» **Voices** - Set the global polyphony
» **Bend** - Set the global pitchbend range
» **Voice mode** - Set the global voice mode
Poly - Polyphonic mode
Poly Portamento - Polyphonic with portamento
Mono Retrigger - Regular mono voice mode
Mono Portamento - Mono legato mode
» **Glide** - Set the global glide time

4 Master Volume

Set the global output level with VU

5 Macro Effects

5 "one-knob" effects for quick tweaking of the sound

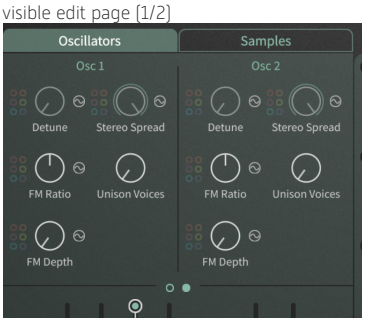
» **Power** ⏻ - Click to enable the effect
» **Cabinet** - Adjusts the sound with special speaker cabinet emulation
» **Phase** - Adds a phasing-like chorus effect
» **Filter** - A one-knob low-pass and high-pass combo filter
» **Shifter** - Adjusts intensity of the pitch shifter effect
» **Space** - Adjusts the amount of the special space (reverb) effect

User Interface - Oscillators Edit

1 Oscillators

Click the Oscillators tab to access Osc1 and Osc2 edit. Both Osc have the same controls:

- **Shape -** Select the oscillator waveshape. Shapes are different for Osc 1 and 2, and by preset.
- **Octave** - Transpose the pitch in octaves
- **Color** - Shifts color based on adjacent samples
- **Pitch** - Fine-tune the pitch in cents
- **Phase Distortion** - Select the PD mode from drop-down menu under the knob and adjust the amount with the knob
- **OSC Page** ●○ - Click the small dots to change visible edit page (1/2)



- **Detune** - Adjusts the detune amount of the unison voices
- **Spread**- Adjusts the stereo width of the unison voices
- **Unison Voices** - Set the unison voices up to 8
- **FM Ratio** - Set the Frequency Modulation ratio
- **FM Depth** - Set the FM depth

2 Amp & Pitch Envelope

- **ADSR** - Adjust the layer level over time using an Attack/Decay/Sustain/Release envelope
- **Attack and Decay Curve** ◴ - Click-drag to adjust the curve of attack and decay/release envelope stages
- **Depth** - Set the depth of the pitch envelope
- **Time** - Set the pitch glide time
- **Time Curve** ◴ - Click-drag to adjust the curve of the glide time

3 OSC Filter

Click the Oscillator Filter tab to access the Osc filter edit. This filter will apply to both Oscs

- **HP Frequency** - Set the high-pass frequency
- **HP Resonance** - Set the high-pass resonance amount
- **HP Env Depth** - Set the filter depth amount for the high-pass filter
- **LP Frequency** - Set the low-pass frequency
- **LP Resonance** - Set the low-pass resonance amount
- **LP Env Depth** - Set the filter depth amount for low-pass filter
- **Key Tracking** - Filter frequencies follow the incoming note
- **Resonance Trim** - Adjusts the balance between HP and LP filter resonance

4 Filter Envelope

- **ADSR** - Typical ADSR envelope for the Filter
- **Attack and Decay Curve** ◴ - Click-drag to adjust the curve of attack and decay/release envelope stages

5 Modulators

Switch between four modulators: LFO A, LFO B, Step Modulator 1 and Step Modulator 2

Click the switch ⦵ at the right of the knobs to show the available Modulators for the parameter, between LFO A, LFO B, Step Modulator 1 and Step Modulator 2 and more

See ***page 8*** for more details

User Interface - Samples Edit

1 Mixer

Sets the mixing balance of the oscillators; Osc1, Osc2, Noise and Sample to send to the FX section

Each oscillator has the following controls:

- **Power**- Enable/disable the oscillator
- **Volume** - Set the oscillator output level
- **Noise type** - Select the noise type of the noise generator
  Pink - Hardware-based pink noise
  White - Hardware-based white noise
  Pink ST - Hardware-based stereo pink noise
  White ST - Hardware-based stereo white noise

2 Samples

Click the Samples tab to access the Sample oscillator

- **Sample** - Change sample with drop-down menu or by using the [<] [>] buttons
- **Sample Start -** Adjusts the sample start point.
- **Octave** - Transpose the pitch in octaves
- **Color** - Shifts color based on adjacent samples
- **Pitch** - Fine-tune the pitch in cents
- **Unison On**- Activate the unison
- **Voices** - Set the unison voices up to 8
- **Detune** - Adjusts the detune amount of the unison layer(s)
- **Spread**- Adjusts the stereo width

3 Amp & Pitch Envelope

- **ADSR** - Adjust the layer level over time using an Attack/Decay/Sustain/Release envelope
- **Attack and Decay Curve** - Click-drag to adjust the curve of attack and decay/release envelope stages
- **Depth** - Set the depth of the pitch envelope
- **Time** - Set the pitch glide time
- **Time Curve** - Click-drag to adjust the curve of the glide time

4 Sample Filter

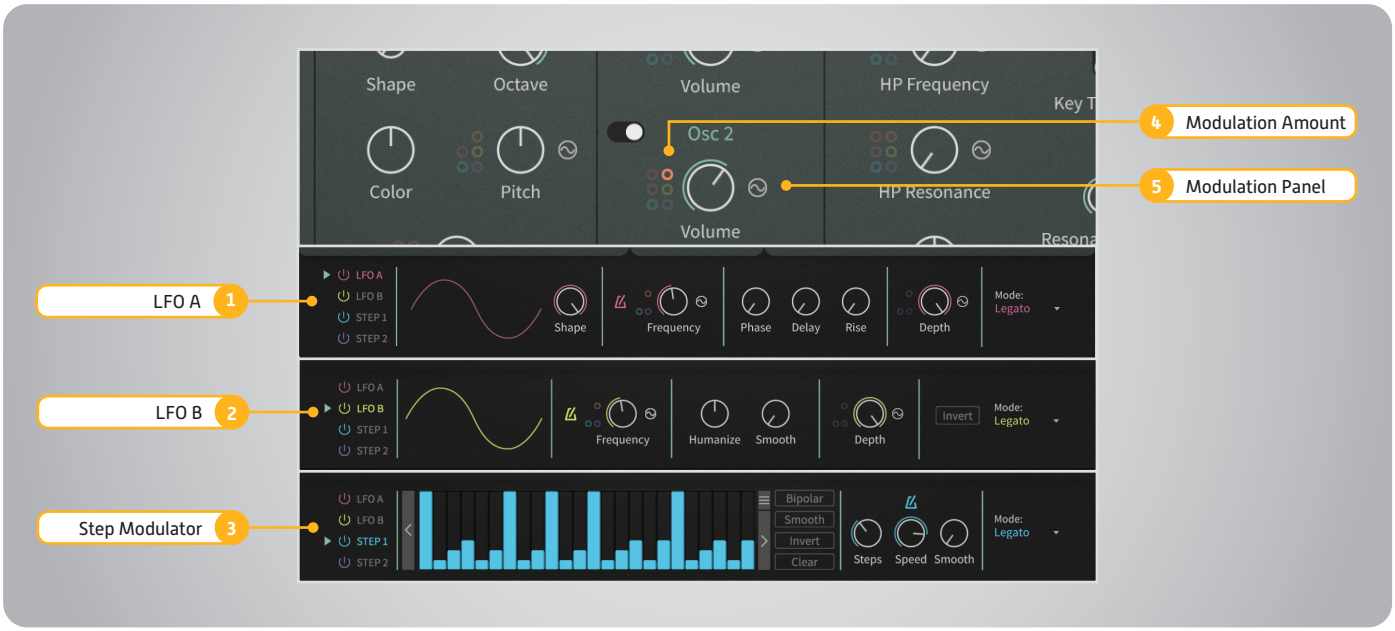
Click the Sample Filter tab to access the sample filter edit

- **HP Frequency** - Set the high-pass frequency
- **HP Resonance** - Set the high-pass resonance amount
- **HP Env Depth** - Set the filter depth amount for the high-pass filter
- **LP Frequency** - Set the low-pass frequency
- **LP Resonance** - Set the low-pass resonance amount
- **LP Env Depth** - Set the filter depth amount for low-pass filter
- **Key Tracking** - Filter frequencies follow the incoming note
- **Resonance Trim** - Adjusts the balance between HP and LP filter resonance

5 Filter Envelope

- **ADSR** - Typical ADSR envelope for the Filter
- **Attack and Decay Curve** - Click-drag to adjust the curve of attack and decay/release envelope stages

User Interface - Modulation Edit



1 LFO A

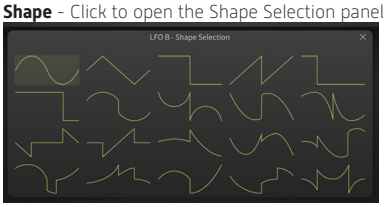
Click LFO A label (left) to access the modulator

- **Power** ⏻ - Enable/disable the LFO
- **Shape** - Select the modulation shape
- **Frequency** - Adjust the modulation speed
  Host Sync Off - Set the speed in Hz
  Host Sync On - Set the speed in musical units such as 1/4, 1/8 dots, 1/16 triplet, etc.
- **Host Sync** - Enable/disable the modulation speed sync to host (DAW project) tempo
- **Phase** - Adjust the LFO start phase
- **Delay** - Set the onset delay time of the LFO
- **Rise** - Set the rise time of the LFO amount
- **Depth** - Set the modulation depth amount
- **Mode** - Set the voice mode between Legato and Retrigger

2 LFO B

Click LFO B label (left) to access the modulator

- **Power** ⏻ - Enable/disable the LFO
- **Shape** - Click to open the Shape Selection panel

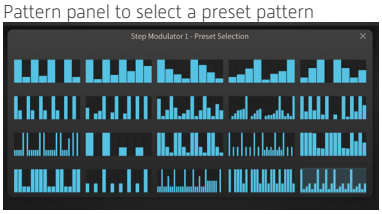


- **Frequency** and **Host Sync** - *See LFO A*
- **Humanize** - Adjust the randomize amount
- **Smooth** - Adjust the smoothing amount
- **Invert** - invert the LFO phase
- **Mode** - Select Legato or Retrigger voice modes
- **Depth** - Set the modulation depth amount

3 Step Modulator

Click Step 1 or Step 2 label (left) to access each step modulator

- **Step Editor** - Click-drag to set the modulation amount per-step
- **Shift -** Shift steps left or right by using the [<] [>] arrows found on the sides of the Step Editor
- **Step Pattern Menu** ☰ - Click to open the Step Pattern panel to select a preset pattern



- **Bipolar** - Enable/disable Bipolar mode
- **Smooth** - Click to smooth the transition between steps
- **Invert** - invert the modulation pattern
- **Clear** - Initialize the pattern
- **Steps** - Set the number of steps
- **Speed** - Adjust the modulation speed
- **Host Sync** - *See LFO A*
- **Smooth** - Adjust the overlap between steps
- **Mode** - Select Legato or Retrigger voice modes

4 Modulation Amount

Internally-modulatable parameters have small mod knobs at the left of their main knobs

Click-drag the available mod knobs to set the modulation amount. You can also click the Open Modulation Panel button for more precise control

5 Open Modulation Panel

At the right of modulatable parameters, click the button to open the Modulation Panel

[Undo Edits] - Click to exit the editor without changes
[Close] - Click to close the editor

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User Interface - FX

1 Delay

- **On-Off** - Click the effect name to enable/disable the effect
- **Host Sync** - Enable/disable the modulation speed sync to host (DAW project) tempo
- **Time** - Set the delay time
- **Feedback** - Set the delay feedback amount
- **Lo Cut / Hi Cut** - Set the delay output's High-Cut and Low-Cut filter frequencies
- **Rotation Angle** - Adjust the rotation angle of the stereo feedback path
- **Mix** - Set the dry/wet balance

2 Reverb

- **On-Off** - Click the effect name to enable/disable the effect
- **Diffusion** - Enables reverb diffusion
- **Size** - Set the reverb room size
- **Decay** - Set the reverb decay time
- **Lo Decay / Hi Decay** - Multiplies the decay time (-/+) for the high and low frequencies
- **Width** - Adjust the stereo width of the reverb from mono to wide stereo
- **Mix** - Set the dry/wet balance

3 Drive

- **On-Off** - Click the effect name to enable/disable the effect
- **Gain In** - Set the input gain
- **Gain Out** - Set the output gain
- **Mode** - Set the drive mode
  Diode - Diode Clipper distortion
  Trash - Hard overdrive
  Tube - Gentle TS overdrive
- **Shape** - Set the high-pass cutoff and asymmetry shape in Diode mode
- **Drive** - Set the drive amount in Trash mode
- **Tone** - Set the low-pass cutoff in Tube mode
- **Amount** - Set the effect amount

4 Chorus

- **On-Off** - Click the effect name to enable/disable the effect
- **Speed** - Set the modulation speed
- **Depth** - Set the modulation depth
- **Edge** - Set the color of the chorus
- **Mix** - Set the effect dry/wet balance

5 Flanger

- **On-Off** - Click the effect name to enable/disable the effect
- **Host Sync** - Enable/disable the modulation speed sync to host (DAW project) tempo
- **Speed** - Set the modulation speed
  Host Sync Off - Set the speed in Hz
  Host Sync On - Set the speed in musical units such as 1/4, 1/8 dots, 1/16 triplet and so on
- **Delay Time** - Set the delay time of the effect
- **Feedback** - Set the feedback amount
- **Mix** - Set the effect dry/wet balance

6 EQ

- **On-Off** - Click the effect name to enable/disable the effect
- **High** - Set the high frequency band gain
- **Mid** - Set the middle frequency band gain
- **Low** - Set the low frequency band gain
- **Crossover Frequency** *f* - Set the frequency between low and middle bands, and between middle and high bands

7 Maximizer

- **On-Off** - Click the effect name to enable/disable the effect
- **Threshold** - Set the input level at which limiting will begin

User Interface - Arpeggiator Edit

1 Arpeggiator

Click Osc, Sample or Both to set the arpeggiator's target

- **Mode** - Click to set the arpeggiator mode: Arpeggiator, or Phraser
- **Octave Low/High** - Lock the sequence in a specific octave range, with lowest and highest octave [Phraser mode only]
- **Motion** - Click to set the arpeggiator motion as played, up, down, or up+down [Arp mode only]
- **Speed** - Set the step duration
- **Steps** - Set the number of steps
- **Octave** - Set the octave range of the arpeggiation
- **Step Editor**

  Vel - Click-drag to set the velocity
  Link - Enable to sustain the previous step
  Mode - Set the step type (Basic, Harmonized or Chord) based on mode
  Pitch - Set a pitch offset in semitones
  Octave - Set a pitch offset in octaves
  Gate - Set the step gate duration
  Pan - Set the step pan
  ▼ - Click the triangle button to right side of each row to either initialize, randomize, or select a preset.

2 Preset

Change presets by drop-down menu or by using the [<] [>] arrows

3 Chord Detector

Indicates the chord type detected from current incoming MIDI notes

4 Shift

Shift a step ahead or behind by using the [<] [>] arrows at both side of the Step Editor

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Preset List

00 Sequenced

A Rivality
Bass Da Seq
Blanket Holidays
Dialogue
DoorMousT
Flat Ozio
Galot 1K
Groove Chords
Hard Boiled
Hyperboreal
Lush
Minimal Pattern
Misuse Delay Wheel
Modded Reality
Monomaniac
Motion Lead
Multi Modulated
Nasty Boy
OMD Bunker
Overcooking
Ricochet Waves
Rolling Chords
Scatterer
Square Party
Steel Hammer
Sticky Mode
Talking Chords
Technoid
Volutions
Vortex Wheel

01 Arpeggiated

Clear Dawn
Connecting The Dots
Droplet
Minor Wave
Moving Arp
Night Vision
Odyssey Duo
Old Rainbow Road
Planetarium
Quiet Onsen
Shadow Knight
Simple Arp
Sync Motion
Tech Eyes
Textural Irregularity
Thoughts In Motion
Unit Echo
Upside Down
Wave Swell

02 Bass

Blastodon
Braam
Cherry Bass
Cole Funk
Cross Line
Cyberpunk
Deviant Wheel
Dirty Ballerina
Distort The Noise
Ducking Raw
Freeze Sub
Heartbeat
High Fuzzy
Impact Sub
Ineducated Modwheel
Infamous
Leicester
Miami Slice
Movements
Open Signal
Overdriven
Phantom Bass
Phatman
Resodriven Wheel
Sentinel
Sign Hole
Silicone
Simple Line
Soft Fifths
Sturgeon Bass
Sub Analog
Sub Grain
Syncope
Thunder Rig
Toronta Bass
Want Some
Wiggly Diodes
Wobble Volt
Yussen Bold

03 Brass

Analog Deep
East Brass
False Unison
Fat Trombone
Fifth Captain
Generous Oscillators
Highlight
Modern Highs
Peplum
Plume Wheel
Pocket Loop
Resotone
Retro Saws
Simple Chords
Sledding
Smiley
Stab Ensemble
Still Mono
Sweet Thing
Topology
Transpoly

04 Lead

8Bit Thrills
Abrasive Detune
Afdt Punk
Agressive Lead
Atmospheric Flute
Downward
Electric Lead
Formant Grit
Funk Aero
House Chord
Jump Chemist
Larsen Boost
Osc Saw
Osc Square
Poly Soft
Power Fall
Syn Legato
Sync Over Five
Talking Harsh
Tech Alles Gut
Track Drive
Vintage Atoms

05 Keys

Alter Echo
Bliss Garden
Broken Tines
Cloud Waltz
Cyber Forest
Dreaming Snowflakes
Eighties Keys
El Rack Organ
Flashlight
French Key
Liquidity
Magnetic Tri
Noise Keys
Opening Titles
Origami Fireworks
Pianoo DC
Space Tides
Square Bouncing
Sweet Harpsichord
Tape Radio
Trash Dream
Vintage Toy Organ

06 Pad

An Equinox
Best Cinema
Cosmic Rays
Das Angle
Delicate Leaf
Fifth Harmony
Harmonic Hall
Mello Pad
Melting
Observatoire
Omens
Raquel Dream
Sahara
Save Game
Seraphic Reverb
Silk Partials
Space Coven
Star Exploration
Stringbrass
Trembling Memories
Tunic
Twin Saws
Vanilla Sunset
Vintage Strings
Volt Motion
Warmth Waves
Wave Saga

07 Pluck & Bells

Astral Journey
Blinking Lights
Deep Alberto
Dirty Bells
Dream My Bell
Drift One
Effect Matrix
Exploring The Past
Fast Delay
Finding Squares
Flutty Xmas
Healer
HX Bells 1
HX Bells 2
Irregular Octaves
Later Changes
Lava Lamp
Malibu
ReChorder
Rival Noises
Status
Steady Tone

08 FX & Rhythmic

Bubble Bath
Deep Crater
Drum Mist
Drum Wide
DruMS
Evolve Ring
Falling Osc
Gargleblaster
Hat Groove
Hat Perc
Hat Simple
Metallic Noises
Phat Kick
Quiet Drum
Rhythm Snake
Silver Woman
Snare
Stumbling Incoherancy
Tom Tune
Worms

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Sample Layer List

Bass

Agrezzive
Bold Bass
Cherry Bass
Chick Sub
Classic One
Contra Pulse
Electric Low
Flat Ric
Footsub
High Fuzzy
Impact Sub
Leicester Square
Lost Digital
Modestelegant
Nastriangle
Nineties House
Noisub
Noisy Hell
Oyez
Poseidon
PWM Alike
Roygive
Spread Square
Squarpince
Synth Bass

FX

Bandpass Oscillator
Brainstorming
Crunchy Low
DnB Swipe
Drumkit
Grezzly
Messy Drone
Neuro C
Paradox Keyboard
Pitch Alarm
Resonant Riser
Robobass
Stairway Resonance
Tiger Mosquito

Lead

Aero
Analog Crude
Boost
Da Lead
Dusty Circuit
Electric Shock
Falldown Power
Fantastic Fourth
Feedback Machine
Grunt Lead
Guitar Drive
Hidden Pluck
Krazy Frog
Larsen House
Lose Weight
Massive
MS 203
Noisy and Nasty
Rave Resonant
Rezobot
Ringo Lead
Rusty
Saw Solo
Sharp Lead
Square Bop
Subject
Tension
Tight High
Track Drive

Pluck

Banjo
Basic Square Pluck
BassKet
Bend Up
Charging
Cheap Short
Detuned Stab
Duck Pluck
Great Octave
High School
In Da House
Loading
Money Bits
Muted Guitar
Plastic Tube
Pulse Glitch
Saw Chords
Signal Incoming
Space Square
Subtle Wobble
Summer Hit
Sympathic Sync
Undecised Cat

Brass

Abrassive
Bad Saw
Big Reso
False Unison
Fuzzy
Gentle Brass
Muted Horns
Parallels
Relax Tubist
Sharpness Itself
Stuck Loop
Trombone Section
Unhuman
Unsure
Whole Section

Keys

Anakeys
Blind and Deaf
Broken EP
Clavichord
Clicky Road
Clicky Touch
Detuned Piano
Digital Accordion
Eight Keys
Falling Keys
Flutty
Footsteps
Fourth Klav
Funfair
Hammond
Korgan
Liquid Keys
Mellow Wurli
Mighty Softness
MS Vibrato
Pulse Talk
Resonant Reed
Saturated Harpsichord
Sweep Tail
Toy Organ
Versailles
Vibrant Tine
Vintage Mellow
Yelosubmarine

Pads

Attackless Guitar
Beyond the Waves
Brasstrings
Bright Fifths
Bugsweep
Crunchy Riser
Empty Fields
Fatness Ascension
Filter Laziness
Grand Opening
Guimbads
Metallic Brass
Mono Strings
Oboe Filter Sweep
Old Circuit
Radio Sine
Sleeping Pad
Smooth Saw
Soft Fifth
Square Pandemy
Suitcase in a Plane
Tentacles
Unstability
Windy Days

Waveform

Osc Saw
Osc Square
Osc Triangle
Pulse
PW 20
PW 35
PW 50
PW 65
PW 80
Ringmod Noise
Ringmod Saw
Ringmod Square PW1
Ringmod Square PW2
Ringmod Square PW3
Ringmod Triangle

Links

UVI

Home	uvi.net/
UVI Portal	uvi.net/uvi-portal
SonicPass	uvi.net/sonicpass
Manage Your Products	uvi.net/download-with-portal
Soundbank Installation Guide	installing_uvi_soundbanks_en.pdf
UVI Workstation User Guide	uviworkstation_user_guide_en.pdf
FAQ	uvi.net/faq
Tutorial and Demo Videos	youtube.com/
Support	uvi.net/contact-support

iLok

Home	ilok.com/
iLok License Manager	ilok.com/ilm.html
FAQ	ilok.com/supportfaq

HX-20

Credits and Thanks

Produced by UVI

Recording / Editing / Sound Design

Vincenzo Bellanova
Alain J Etchart
Théo Gallienne
Carlo De Gregorio
Kévin Guilhaumou
Aloïs Lang-Rousseau
Emeric Tschambser

Software + Scripting

Thomas Kowalski
Rémy Muller
Olivier Tristan
Emeric Tschambser

GUI + Design

Nathaniel Reeves

Documents

Nathaniel Reeves
Kai Tomita

UVI.NET