Meshmerize — quick reference

Every control, one line each. Resolume has no place for a plugin to explain itself, so keep this page open the first few times. The full explanations are in the User Guide.

Preset

One click sets the look, the Multiply formation, the audio reactions and the post FX. The panel hides controls that do nothing in the current mode, so it is shorter than this list.

Control	What it does
Preset	one-click look; also sets Multiply and the FX

Model

What to play: your own file, a folder of files, or one of the built-in shapes.

Control	What it does
Model File	load a glTF, GLB, OBJ, STL or PLY file
Folder	every model in that file's folder
Shape	built-in primitives and the model library
Up Axis	fixes a model lying on its side
Moon Phase	light from the side: full (0) through last quarter, new, first quarter, back to full (1)
Iris Color	turns the colour of an iris (parts named Iris or Tint); 0 leaves it as made

Logo

Your own artwork printed on the model. Built-in models with a logo area: the sports balls and bat, the puck, the microphone, headphones, rocket and heart; models with a screen (TV, vinyl record, gift tag) print it there. In your own files, name a part "Logo".

Control	What it does
Logo File	a PNG, SVG or JPG printed on the model's Logo area (its screens when it has none)
Logo Size	1 fills the logo spot; turn it up to grow into the space around it

Animation

Only shown when the loaded glTF has animation.

Control	What it does
Animation	which animation clip to play
Anim Speed	playback speed; negative runs backwards
Anim Offset	scrub the animation; sync it to the BPM

Look

How the surface is drawn and coloured.

Control	What it does
Render Mode	shaded, wireframe, points, chrome, x-ray...
Surface	what colours the model
Color	main colour
Color Sat	main colour: saturation
Color Bri	main colour: brightness
Color Alpha	main colour: opacity
Color 2	second colour, used by the Gradient surface
Color 2 Sat	second colour: saturation
Color 2 Bri	second colour: brightness
Color 2 Alpha	second colour: opacity
Wire Color	colour of the wireframe edges
Wire Color Sat	wire colour: saturation
Wire Color Bri	wire colour: brightness
Wire Color Alpha	wire colour: opacity
Wire Width	edge thickness, in pixels
Point Size	dot size in Points mode
Rainbow Speed	how fast the Rainbow surface cycles
Model Opacity	fade the model and its glow (presets leave it alone)

Light

The key light and how the shadow side reads.

Control	What it does
Light Angle	where the key light comes from
Light Height	how high the key light sits
Ambient	how bright the shadow side is
Gloss	up: a tight bright highlight; down: matte; middle: as the file says
Rim	edge light; great on dark backgrounds

Transform

Where the model sits and how it turns. Every value is in model units; a model is about 2 units tall.

Control	What it does
Scale	size of each copy
Position X	move right and left
Position Y	move up and down
Position Z	move toward and away from the camera
Rotate X	tip forward and back, in degrees
Rotate Y	turn, in degrees
Rotate Z	roll, in degrees
Spin X	keep tipping, turns per second
Spin Y	keep turning, turns per second
Spin Z	keep rolling, turns per second
Freeze	hold everything still: spin, ripple, flow, animation
Freeze Spin	stop the turning only; everything else keeps moving
Face Front	turn back to face the camera, from wherever it is

Camera

The view.

Control	What it does
Distance	dolly the camera in and out
Field Of View	10 is flat and telephoto, 90+ dramatic
Tilt	look down on, or up at, the model

Multiply

One model becomes many, drawn in a single GPU pass.

Control	What it does
Multiply	many copies: grid, ring, mandala, zoom, tunnel...
Copies	how many copies
Columns	copies across
Rows	copies down
Layers	copies deep, or rings / arms / shells
Spacing	gap between copies; 1 = just touching
Row Gap	space between rows, rings or shells, on top of Spacing
Taper	minus: tiny middle, huge rim (mandala); plus: the outside shrinks
Fit In Frame	scale the whole formation to fit the frame
Align	copies turn to follow the formation
Array Spin Y	turn the whole formation
Array Spin Z	spin the whole formation like a wheel
Rotate Step	each copy turned further than the last
Random Rotate	give every copy a random tilt
Random Spin	every copy tumbles at its own speed
Random Size	make the copies uneven in size
Wave	a ripple travels through the copies
Wave Speed	how fast the ripple travels
Flow	copies travel along the formation; the speed of a Zoom
Hue Spread	give every copy a different colour

Explode

Every triangle (or quad, or polygon) is a shard that can fly off, tumble and shrink.

Control	What it does
Explode	blow the model into shards
Burst	one shot: explode and reassemble
Burst Time	how long a burst takes
Explode Mode	which way the shards fly
Scatter	how uneven the shards' flight is
Shard Spin	shards tumble as they fly
Shrink	shards shrink away to nothing
Stagger	shards leave one after another
Stagger By	the order the shards leave in

Deform

Bend and ripple the surface itself.

Control	What it does
Twist	wring the model around its upright axis
Wobble	liquid, noise-driven surface motion
Wobble Scale	size of the wobble ripples
Wobble Speed	how fast the surface moves

Audio

Driven by Resolume's FFT. Kicks are sudden rises in the bass, so these land on the beat.

Control	What it does
FFT	audio source: composition, layer or external
Audio Gain	how eagerly it reacts: up for a quiet or busy mix, down for only the big kicks
Bass Pulse	kicks pump the scale
Bass Explode	kicks blow the model apart
Bass Spin	kicks push the spin along
Bass Copies	each kick adds this many copies
Bass Spread	the formation expands with the bass
Bass Flash	kicks flash the model toward white
Bass Glow	the bloom breathes with the bass
Bass Color	each kick moves the colours on
Bass RGB Split	kicks split the image into colour fringes
Bass Glitch	kicks slice and shift the image
Bass Trails	kicks leave longer trails
Bass Feedback	kicks throw a luma-keyed echo of the frame outward
Bass Texture	kicks push the texture up
Audio Wobble	the overall level, not just kicks, drives Wobble

Post FX

Applied to the model after it is rendered, never to the background video.

Control	What it does
Glow	bloom around the bright parts
Glow Size	how far the bloom spreads
Trails	every frame fades over the next
Trail Zoom	trails stream outward, or suck inward
Trail Rotate	trails turn as they fade: spirals
Feedback	video feedback: bright parts echo over the next frame and drift out
Feedback Key	luma key: parts brighter than this echo; 1 = nothing at all
RGB Split	colour fringes, strongest at the edges
Glitch	slices and blocks jump sideways
Texture	grain, scanlines, CRT, halftone, xerox...
Texture Amount	how strong the texture is
Texture Scale	coarse or fine; changes with the texture
Texture Speed	only the moving ones: grain, scanlines, xerox dust
Texture On	the model alone, or the whole frame

Output

How the result leaves the plugin.

Control	What it does
Background	transparent, black, or the video in FX
Double Sided	draw both sides of every surface
Antialias	edge smoothing; 4x is the default
Video Map	how the video wraps onto the model
Model Fade	seconds to crossfade to the next model; 0 cuts

License

Control	What it does
License Key	paste the key from your receipt; type RELEASE to move the license to another computer, or manage it at beautifulengine.com/oddsandengines/license

Meshmerize © Beautiful Engine LLC.