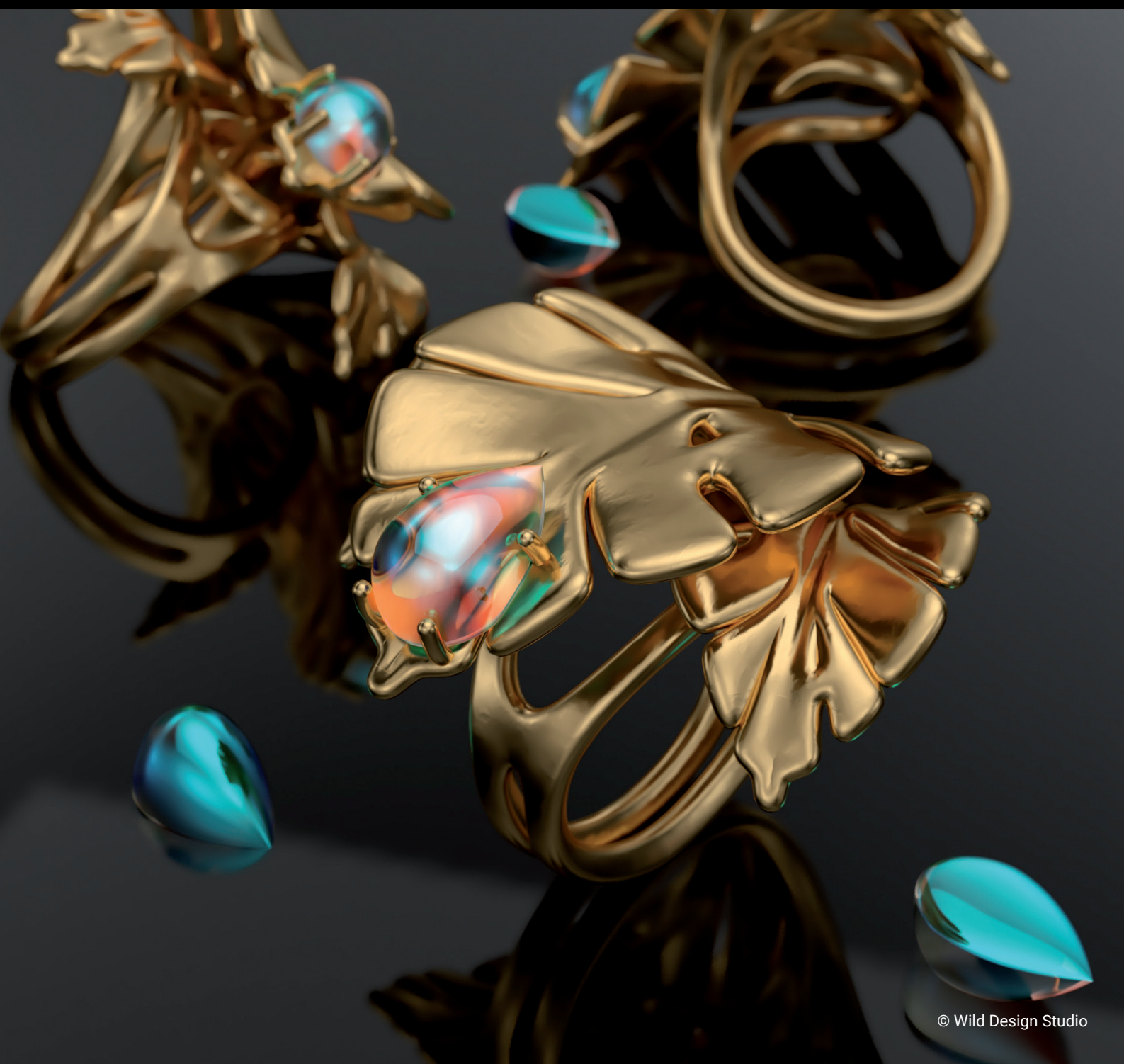


CHAO2GROUP

What's New in V-Ray Next for Rhino

March 2020



PRODUCT DESCRIPTION

V-Ray for Rhino is a highly accurate renderer for McNeel Rhinoceros, enabling designers to predict and present their designs with the highest level of realism and reduce the need of physical prototypes. V-Ray greatly increases Rhino's ability to handle large scenes and can be used directly within Grasshopper.

V-Ray Next for Rhino is much more than a do-it-all renderer that creates gorgeous images of your designs. It's also a full suite of tools to help you accomplish more in Rhino than ever before. V-Ray Next makes it easier to manage everything in your scene — even the crazy complex ones.

V-Ray Next is smart, too. It learns from your scene to make lighting faster. And it can set your camera exposure and white balance automatically. It's fast. V-Ray Next for Rhino is 50% faster overall. GPU rendering is 2x faster. And it's up to 7x faster with the new Adaptive Dome Light. It also supports the NVIDIA RTX technology for even better GPU performance. V-Ray Next for Rhino extends what is possible in Grasshopper even further - now you can animate Grasshopper definitions as well as cameras and sunlight, and measure real-world illumination values — all right in Grasshopper.

V-Ray Next for Rhino is compatible with Rhino 5 and Rhino 6. V-Ray for Rhino is supported on Windows only.

WHAT'S NEW

SUPERCHARGE RHINO



DO MORE IN RHINO THAN EVER BEFORE

Maximum creative control, minimum effort

Power up with scripts. Use Rhino's Script and Python to program V-Ray Next to do even more for you, like automating scene management or accessing parameters not shown in the UI. With the latest update the V-Ray scripting API provides more options to start a render. You can save and load settings from a .vropt file for even more control over your scene setup.

Color picker temperature. The V-Ray color picker introduces a Kelvin temperature slider, which automatically provides a corresponding RGB color. You can also choose the exact color you need with the right hue, saturation and value variation with the Color Assistant, V-Ray Color Picker's new extension.

Cryptomatte element. The Cryptomatte render element automatically generates and stores object or material-based masks which can be exported in a multichannel OpenEXR file. This removes the hassle of creating dozens or hundreds of Multimattes and it's perfect when you need to accurately select objects in post-production.

Depth of field focus animations. You could now render camera focus distance changes in animation. This is particularly useful when you render a physical depth blur with the focus point or camera position changing throughout the sequence.

Automating snapshots & batch renders. Now V-Ray Batch lets you schedule and render jobs to V-Ray Swarm or Chaos Cloud, making it easy to render snapshots from the same project or views from multiple Rhino files all at once.

Easy to resize lights. Adjust the size and shadow softness of lights without affecting their intensity. Change the size of instanced lights by changing just one.

Better management of V-Ray Objects. A simple new UI makes it easy to create, edit and manage V-Ray objects like lights, section clippers and fur.

Unified installer. Enjoy smooth, single-step installation of all the components included in the V-Ray package.

Decals support. With support for Decals, you can add images to paintings, signs, screens and more. Decals work with both native and V-Ray materials.

Updated V-Ray Frame Buffer lens effects. Simulate real-world camera lens effects with new procedurally generated dust and scratches.

More accurate viewport previews. Get a more accurate preview of your materials in the Rhino viewport with improved reflections, refractions, bump maps and more.

Color theme. A new "Bright" color theme is now available so you can change the appearance of your V-Ray user interface.



SUPERIOR GRASSHOPPER SUPPORT

Powerful capabilities that maximize value

Proxy Mesh export from Grasshopper. The new V-Ray Exporter component allows you to export animations from Grasshopper. It can generate .vrmesh or .vrscene files based on the Grasshopper definition, so you can export animated projects as animated proxies.

Animated sun and cameras in Grasshopper. Now in Grasshopper, you can animate sunlight and cameras using the V-Ray timeline. Then it's just a quick export back to Rhino for final rendering.

Measuring illumination in Grasshopper. The new lighting analysis render element makes it easy to visualize and evaluate the real-world illumination levels of your Grasshopper scene.

V-Ray Graph component. This is an advanced value remapping utility component that exposes a bezier curve editor. Combined with the V-Ray Timeline, it enables you to create more advanced animation setups. Adding keyframes is easy with the context menu button.

Familiar Grasshopper workflow. Working with V-Ray Next in Grasshopper is simple. You hook up V-Ray components exactly the same as Grasshopper's native ones. So it's easy to get the results you're looking for.

Real-world cameras in Grasshopper. Use real-world camera settings for aperture, shutter speed and ISO. Together with the sun and sky system, you'll be able render your Grasshopper scene accurately for lighting analysis.

Directional Light. Create stylized lighting schemes to render non-realistic, stylized light. Use multiple directional light sources, for example, to demonstrate how light accumulates throughout the day.

Animated Grasshopper definitions. Animate and render parametric designs via the V-Ray timeline to explore conceptual or photorealistic versions of your models.

Latest enhancements. V-Ray for Grasshopper, update 2 brings a number of improvements including bitmap textures, vertex colors, virtual reality camera types and many more.

Orthographic camera in Grasshopper.

V-Ray for Grasshopper now supports Orthographic cameras. Increase the Orthographic Zoom Factor value of the Camera component to see the effect.

Renderer lights support. Connect any light source component directly to the Renderer without having to create an in between light rig.

Library materials in Grasshopper. You can now easily access the preset material library through the File component.

WORK FASTER



POWERFUL ASSET MANAGEMENT

Keep track of everything all in one place

Universal asset preview. Preview your materials, lights, textures and render elements in a single viewer. Observe how parameter changes affect the appearance of the asset in a specific isolated setting.

Drag and drop material assignment. Easily apply materials with a simple drag and drop from the Asset Editor directly onto scene objects or layers.

UI display levels. Use either the Basic set of asset parameters or activate the Advanced mode to list all options.

Multi-selection. Select multiple scene or library assets as well as multiple toolbar filters to speed up your workflow.

Asset outliner. Manage all of your assets including lights, materials, textures, geometry and render elements all in one place.

Asset library UI. Manage assets of any type in an intuitive customizable folder structure. Quickly search through huge number of assets in either the built-in library or in any other library location.

Intuitive asset creation. Quickly create new assets in the Asset Editor from the footer. Create menu, outliner filter icons or form the library Create section.

Updated materials workflow. Create and manage V-Ray materials directly in Rhino's Materials panel. Converting a Rhino native material to a V-Ray one and vice versa is now as simple as changing its Type. V-Ray materials can also be assigned to layers using the native Rhino approach.

Improved snapshots support. Save and restore Rhino Snapshots with V-Ray material assignments.

Proxy mesh materials. Import or create a proxy mesh asset and V-Ray will automatically generate a set of material slots, making it easier to manage materials.

Partial scene export. Export only selected objects as a .vrscene file containing geometry and the applied materials.

Improved materials. The underlying shading structure of all scene materials is optimized. Material attributes can now be added or removed based on the user's needs.



SIMPLIFIED RENDER CONTROLS

Click less, render more with new and improved UI controls

Simplified render settings. A refined and updated UI makes render setup easier than ever.

Refined camera controls. A new intuitive layout for the camera controls lets you manipulate the quick and advanced parameters at the same time.

Custom output resolution. Specify custom pixel resolutions without bothering with the aspect ratio.



ENHANCED LIGHTING WORKFLOWS

Get the perfectly exposed image with automatic analysis of your scene

Automatic exposure & white balance. Capture the perfect exposure every time. The new Auto Exposure and Auto White Balance camera controls make rendering as simple as point and shoot.

Lighting analysis tool. The new Lighting Analysis render element makes it easy to visualize the real-world illumination (Lux) values of any scene.

Adaptive Dome Light. Render faster, cleaner and more accurate image-based lighting that's up to 7x faster. The new Adaptive Dome Light also removes the need to set up Portal lights for interiors.



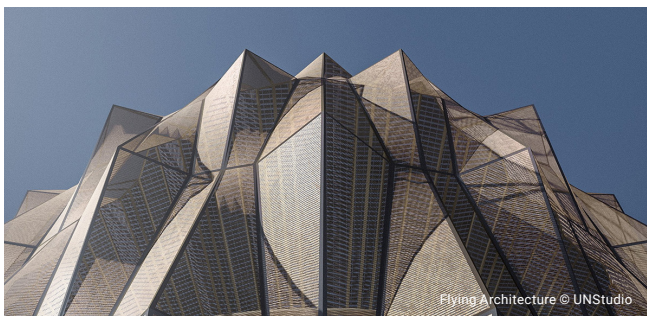
NEW MATERIALS AND TEXTURES

More control over the look of your scenes

Material metalness. The V-Ray Material adds native support for metallic reflections (Metalness) for greater compatibility with PBR materials from applications like Substance Designer.

Curve color corrections. Fine-tune the colors of any texture map using RGB or HSV curve controls.

RENDER FASTER



NEXT LEVEL PERFORMANCE

Faster renders across the board

V-Ray GPU boost. V-Ray for Rhino now supports NVIDIA RTX cards, tapping into the extra ray-tracing hardware acceleration that comes with RTX class GPUs.

Scene intelligence. Automatically analyzes your scene to optimize rendering so you get the best quality in less time.

New Light Cache algorithm. The new default hash map Light Cache calculation mode resolves most common artifacts and is optimized and more stable when used in animations.

Optimized interactive rendering on the CPU.

More responsive CPU interactive rendering when editing scene camera, lighting and materials. The Preview Swatch scenes are also modified to resolve more quickly and use fewer CPU resources.

Optimized materials. V-Ray materials have been fine-tuned for faster render speeds, improved GPU rendering, and Chaos Cloud compatibility.

2x faster GPU. Cuts rendering time in half again when using GPUs (as compared to V-Ray for Rhino 3.6).

Block instancing optimizations. Better handling of instanced Rhino blocks, which translates into improved performance and lower memory usage, especially for heavy scenes.

Render speed. V-Ray Next has been optimized to render 50% faster overall — and up to 7x faster with the new Adaptive Dome Light.



NEW DENOISER

Get cleaner renders in an instant

Viewport rendering and denoising. Look at the denoised image while rendering in the Rhino viewport.

Quick denoiser engine switch. Switch from V-Ray to NVIDIA AI denoising using a toggle in the Renderer rollout. The Update Effects slider is also located in the Renderer rollout for easy access.

Denoised render elements. Denoise individual render elements for added control in compositing.

AI denoiser. With the new NVIDIA AI Denoiser, V-Ray delivers instant feedback with less noise. So you get cleaner images while you design.

Norsk leverandør:



Infinity Innovations

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