



# E-on Software Announces the Availability of its 2023 Release for VUE, PlantFactory and PlantCatalog Solutions

e-on software's 2023 release adds over 600 additional feature, performance and user experience enhancements including feature parity in all product titles, Unreal Engine 5 plugins, new cutout leaf editor, vertex color support, instancing, redesigned node graph edition and updated integration and interoperability compatibility.

Paris, France – January 11, 2023 – E-on software, a leading global developer of software for the creation, animation, rendering, and integration of natural 3D environments in the computer graphics, VFX, architecture, and gaming industries, announced the immediate availability of the 2023 Release of its VUE, PlantFactory and PlantCatalog Exporter software.

A new free trial version is also available of its VUE, PlantFactory and PlantCatalog software which includes all the updates from the new release.

VUE What's new page: https://info.e-onsoftware.com/vue/new\_features

PlantFactory What's new page: <a href="https://info.e-onsoftware.com/plantfactory/new\_features">https://info.e-onsoftware.com/plantfactory/new\_features</a>

The full release note details are available online at: <a href="https://info.e-onsoftware.com/release-notes">https://info.e-onsoftware.com/release-notes</a>

## **Feature parity for Creator users**

Users of e-on software's lowest tier product version will now benefit from the same feature set from the Professional software line, thus removing all former render size restrictions, as well as bringing all interoperability features.

Creator users now get access to:

- Unlimited render size for static and animated renders
- Full export capacity including full scene export, HDRI and panoramic sky exports, 3D standalone clouds and cloud layers export as OpenVDB, Material baking, export of any kind of meshes (terrains, rocks, hyperblobs, Boolean primitives, splines, plants, EcoSystem populations, etc.)
- All integration plugins for Autodesk 3ds max and Maya, Maxon Cinema 4D, Newtek Lightwave (VUE only), Epic Unreal Engine (PlantFactory and PlantCatalog only), with





native shader conversion for Redshift, Arnold, V-Ray and Renderman render engines, as well as Unreal and Omniverse native shaders.

- Import and export of motion tracking information
- Multipass and G-buffer rendering
- Python console and API (VUE)
- Live link to ZBrush and Nvidia Omniverse

The Creator line of products is now under a "for personal non-commercial use" clause for any 3D asset created with the newly accessible export and conversion features.

# Redesigned Node Graph User experience

Continuing the node and graph editing improvements from the past release, the function graph and node editing workflow received several UX and performance enhancements such as:

- Node search engine in the UI and through mouse and keyboard shortcuts
- Intelligent and automatic node insertions
- Redesigned node selector
- Node type in-graph highlighting, including MetaNode and Component types
- Vastly improved node to node connection handling
- Drag and drop of image files into the graph
- Discard any node from computation
- Resizable node previews
- And a lot more.

## PlantFactory Cutout leaf and Instance nodes

Artists can now create custom meshes with the new cutout leaf node by placing points on an underlying texture. This is a must-have feature for working with atlas maps and for creating vegetation for games. The algorithm takes care of generating the polygon subdivision within the user-defined shape.

A rib edge can be optionally included in the polygon flow to ensure that the resulting mesh can be folded and deformed. The cutout node also includes a lateral profile editor for adding three-dimensional depth to the cutout mesh, an axis editor for deformation as well as gravitropism, twisting and midrib settings and support for ambient motion breeze in wind animations. Alternate cutouts and cutouts in crossed-plane mode can be created, and LODs are also supported. Finally, the cutout node ships with 42 preset cutout shapes.

The new instantiation node replaces individual geometry primitives or leaf cutouts with lightweight instances upon export. PlantFactory will generate a point cloud onto which copies of the geometry will be placed as instances. As part of the point cloud, the scale, position and rotation





of the instances will be randomized. This creates much smaller file sizes and lightweight files for better performance, especially in real-time engines. Instance export is available for FBX and USD.

### PlantFactory and PlantCatalog post process Vertex Colors with Ambient Occlusion

PlantFactory and PlantCatalog Exporter now support vertex colors as a post-processing effect once the final mesh has been computed. The 2023 release supports the following features as vertex color values:

- Material blending weight for recreating material blends between primitives, e.g. between trunk and branches
- Leaf color shift (hue, saturation & lightness) from leaf nodes for recreating leaf color variations without additional textures
- Material color for recreating procedural materials (e.g. materials created with noises and fractals in the material graph) without having to bake them into textures
- Ambient Occlusion for pre-computing AO on the final plant mesh.

Artists can create up to 8 vertex color sets per project and mix and match as many of these pieces of information within one set as they have channels available (R, G, B, A or simply RGB in total). Vertex colors can be previewed in the viewport on a per-set and per-channel basis and they are computed for each LOD in the plant. The post-processing options are also available within the PlantFactory/PlantCatalog importer plugins (3ds max, Maya, Cinema 4D and Unreal Engine).

# Other notable new features in VUE and PlantFactory 2023

In addition to the main features, e-on software has added over 600 other enhancements and fixes enhancements such as:

- Substantial speed-up of the 3D display computation of the Terrain Editor.
- Average performance gain for plant graph computation of 20%.
- Clouds can be exported as NanoVDB.
- Cloud changes are now synced with the Omniverse stage.
- Clearcoat index of refraction is now supported in Substance Materials.
- Nanite options such as "Preserve area" and "Enable Nanite" can be activated automatically by the plugin in Unreal Engine 5.1.
- Proper sRGB color space handling for colored texture maps.
- Baked procedural textures are now computed with increased baking precision and with optional texture anti-aliasing for smoother color transitions.
- Two-sided materials can now be converted with the VUE and PlantFactory plugins for Cinema 4D standard / physical renderers. Previously, the backside conversion was not supported.
- New default workspace UI in PlantFactory





- Improved Filter Editor with correct extrapolation of the curve outside of the filter's boundaries.
- "Apply additional bump" on the displacement tab in the Material Editor applies the displacement function or texture used as an additional bump layer to the material.
- Bump mapping can be inverted on the backside of a face (e.g. on leaves), just like normal mapping.
- Support for backlight / translucency conversion with Arnold in all applications.
- The cloud position input in the Function Editor can now optionally take altitude and height modulation influences into account.
- New options in the cloud position input nodes allow switching between local and world coordinates without causing a scale difference of 2000 as before (the old behavior is still available as legacy mode for backwards compatibility).
- New quality boost slider for displaced infinite water planes to avoid excessive memory usage.
- New menu for viewport options above the 3D view, replacing the preview menu from previous versions and any contextual menus with viewport settings.
- Uniform subdivisions for material displacement in the Material Editor are now supported.
- No more hidden elements in the UI that would only appear when you hover over them (e.g. the variance fields or the controls next to the material previews in nodes, such as hooking points). Now, all fields are displayed immediately, making the workflow more user friendly.
- And a lot more...

## Interoperability and integration technology updates

The integration plugins are now supported in Autodesk 3ds Max 2023, Autodesk Maya 2023 Cinema4D S26 and 2023. PlantFactory and PlantCatalog importer plugins are also available for Unreal Engine 4.25 to 5.1.

Native shader conversion is now available for Redshift in 3ds max (2022 and above) as well as V-Ray 6 for 3ds max, Maya and Cinema 4D. Hybrid rendering is also supported with V-Ray 6 for 3ds max and Maya.

#### **EULA update**

The 2023 product line also receives an updated End User License Agreement to expand and better clarify what end users can do commercially with the 3D asset they produce.

Previously fully restricted outside of an internal production scenario, users of the Professional and Enterprise licenses will now be allowed to publicly sell their fully authored and exported 3D assets on online e-commerce platforms, for as long as they keep their license active.

#### **Availability**





The new update is available for download as a free software update for all registered users of the company's VUE, PlantFactory and PlantCatalog solutions. Users will find the software update download links on their user account page (under the Software Center tab)

The 2023 trial versions are also immediately available at no cost from <a href="https://info.e-onsoftware.com/try">https://info.e-onsoftware.com/try</a>.

All VUE, PlantFactory and PlantCatalog Exporter software titles are available in English, French and German and perform under all versions of Windows 8, Windows 10 and Windows 11(64 bit only), and Mac Intel (64 bit) for MacOS 10.14 to MacOS 12.

## **Pricing**

Creator licenses start at \$19.95 per month, with annual licenses retailing for \$199, 3 years licenses for \$398 and 5 years licenses for \$597. The Plant Catalog Creator extension for VUE and Plant Factory Creator retails for \$99 per year, with 3 and 5 years licenses also available.

Professional licenses start at \$75 per month, with annual licenses retailing for \$750, 3 years licenses for \$1500 and 5 years licenses for \$2250.

Enterprise licenses start at \$99 per month, with annual nodelocked licenses retailing for \$990, 3 years licenses for \$1980 and 5 years licenses for \$2970. Floating licenses are available, check online for conditions and pricing.

PlantCatalog retails for \$249.95 per year, with 3 years licenses retailing for \$499.90 and 5 years licenses for \$749.85.

## **Supporting resources**

- Setting up vertex colors and Ambient Occlusion in PlantFactory: http://bit.ly/3kaGBz2
- Using vertex color sets from PlantFactory and PlantCatalog plants in other apps: <a href="http://bit.ly/3vURmbr">http://bit.ly/3vURmbr</a>
- Working with the Cutout Leaf Node in PlantFactory: http://bit.ly/3X48tng
- Mastering iteration nodes in PlantFactory: <a href="http://bit.ly/3X4Kt3c">http://bit.ly/3X4Kt3c</a>
- Exporting instances from PlantFactory with the Instantiation node: http://bit.ly/3Quu5Xs
- Importing PlantFactory & PlantCatalog plants into Unreal Engine 4 and 5: http://bit.ly/3GY6mfc

More information on VUE: <a href="https://info.e-onsoftware.com/vue">https://info.e-onsoftware.com/vue</a>

More information on PlantFactory: https://info.e-onsoftware.com/plantfactory

More information on PlantCatalog: <a href="https://info.e-onsoftware.com/plantcatalog">https://info.e-onsoftware.com/plantcatalog</a>





Video demonstrations for all available species in the PlantCatalog collection can be viewed on the company's dedicated <u>YouTube playlist</u>.

#### **About e-on software**

E-on software is the leading developer of solutions for the creation, animation, rendering and integration of natural 3D environments (VUE, PlantFactory and PlantCatalog). E-on software products are used worldwide by the film, television, architecture, game, science, educational and entertainment industries.

E-on software products were used in feature films such as "Dr. Strange," "Kubo and the 2 Strings," "Jupiter Ascending," "Minions," "Guardians of the Galaxy," "The Croods," "Dragons 1&2," "Hunger Games," "Hugo," "Tintin," "Super 8," "Thor," "Avatar," "Clash of the Titans," "Sucker Punch," "Despicable Me 1&2," "The Wolf Man," "2012," "Lovely Bones," "GI Joe – The Rise of the Cobra," "Land of the Lost," "Terminator 4, "The Curious Case of Benjamin Button," "Indiana Jones 4," "Monster Vs Aliens," "Australia," "The Spiderwick Chronicles," "KungFu Panda," "Pirates of the Caribbean 2" and TV series such as "Spartacus," "Smallville," "Battlestar Gallactica," "Caprica," "Stargate Atlantis," "Stargate Continuum," "The Vampire Diaries" and more. Read more on these stories in e-on software's Spotlights section: <a href="https://info.e-onsoftware.com/meetourusers">https://info.e-onsoftware.com/meetourusers</a>

E-on software was founded on the premise that powerful graphics tools should never get in the way of the designer's creativity. By investing significant resources in research and development, e-on software is able to deliver cutting-edge, user friendly technologies that produce stunning digital nature scenery.

In 2015, e-on software was acquired by Bentley Systems and now operates as an internal venture subsidiary.

E-on software is based in Paris, France. For more information visit http://www.e-onsoftware.com.

## **About Bentley Systems**

Bentley Systems (Nasdaq: BSY) is the *infrastructure engineering software* company. We provide innovative software to advance the world's infrastructure – sustaining both the global economy and environment. Our industry-leading software solutions are used by professionals, and organizations of every size, for the design, construction, and operations of roads and bridges, rail and transit, water and wastewater, public works and utilities, buildings and campuses, mining, and industrial facilities. Our offerings include *MicroStation*-based applications for modeling and simulation, *ProjectWise* for project delivery, *AssetWise* for asset and network performance, Seequent's leading geoprofessional software portfolio, and the *iTwin* platform for infrastructure digital twins. Bentley Systems employs more than 4,500 colleagues and generates annual revenues of approximately \$1 billion in 186 countries.





## www.bentley.com

© 2022 Bentley Systems, Incorporated. Bentley, the Bentley logo, AssetWise, iTwin, MicroStation, ProjectWise, Seequent, VUE, PlantFactory and PlantCatalog are either registered or unregistered trademarks or service marks of Bentley Systems, Incorporated or one of its direct or indirect wholly owned subsidiaries. All other brands and product names are trademarks of their respective owners.

Press Contacts
<a href="mailto:press@e-onsoftware.com">press@e-onsoftware.com</a>
+33 1 83 64 46 95 (Europe)

#### Follow us:

Facebook: www.facebook.com/eonsoftware

Twitter: www.twitter.com/e\_onsoftware

Instagram: https://www.instagram.com/eonsoftware/

LinkedIn: www.linkedin.com/company/e-on-software