

- [skip to content](#)



User Tools

- [Log In](#)

Site Tools

 Search
 ▾ >

Trace: • [treewindowproperties](#)

Table of Contents

- [General Rendering](#)
- [Hand Drawing](#)
- [Shadow Mapping](#)
- [Manipulator](#)
- [Frustum](#)
- [Viewport](#)
- [Screenshot Safe Frame](#)
- [Miscellaneous](#)
- [Screenshot Assist](#)
- [Perspective Camera](#)

Tree Window

The 'Tree Window' property bar controls various rendering and viewport states.

General Rendering

Use Shaders

When enabled, OpenGL shaders will be used to render the tree. When disabled, a fixed-function pipeline is used instead (which may be necessary for older graphics cards). (*Boolean*)

Transparency

- **Best available (A2C if possible):** If your graphics card capabilities and settings are such that

alpha to coverage and multisampling are available, alpha to coverage will be used for transparency (see **Edit→Preferences→Rendering** to enable multisampling). Otherwise, alpha testing is used. *(Enumeration)*

- **Alpha test only:** Alpha testing is used for transparency. *(Enumeration)*
- **Blending only:** Blending is used for transparency. The geometry is not sorted so this setting will typically result in many value errors related to alpha blending and the depth buffer. *(Enumeration)*
- **Alpha test and blending:** Both alpha testing and blending are used. This reduces the errors from “blending only” but does not eliminate them. *(Enumeration)*
- **None:** All geometry is opaque. *(Enumeration)*

Alpha Test Value

Only geometry with alpha values greater than this number will be rendered when alpha testing is enabled. *(Percentage)*

Tree Selection Style

Upon selection, the selected objects are depicted in the Tree Window with the following style:

- **Highlight:** Draws selected generators and node edits in a “highlighted” color. This method is the slowest of these styles to redraw, which may have a computational impact on high-detail trees. *(Enumeration)*
- **Outline:** Draws an outline around each selected generator, object, and node edit. This method may slow down navigation in the Tree Window with high detail trees. *(Enumeration)*
- **Wireframe:** Draws an overlay of the wireframe on top of each selected generator, object, and node edit. *(Enumeration)*
- **Frame:** Draws the frame of each selected generator, object, and node edit. *(Enumeration)*
- **Box:** Draws a bounding box around each selected generator, object, and node edit. *(Enumeration)*

Anisotropic Filtering

The amount of oversampling used for anisotropic filtering. *(Percentage)*

Conserve Graphics...

Enabling this option causes tree rendering to be slower, but use far less memory on the graphics card. This option should only be used on high polygon tree models or when the SpeedTree Modeler is used concurrently with other graphics applications. *(Boolean)*

3D Icon Scale

Controls how large force icons appear in the 'Tree Window'. *(Float)*

Hand Drawing

Spacing Style

Units used for the minimum allowed distance between control points. *(Enumeration)*

- **Relative:** Space between control points is a percentage of the parent branch's length set with the 'Relative Spacing' property value.
- **Absolute:** Space between control points is a real-world unit size set with the 'Absolute Spacing' property value.

Relative Spacing

The minimum distance (relative to the parent branch's length) allowed between control points. *(Float)*

Requires a Spacing Style of 'Relative'.

Absolute Spacing

The minimum distance (as a real-world unit) allowed between control points. *(Float)*

Requires a Spacing Style of 'Absolute'.

Shadow Mapping

Resolution

The width and height (in pixels) of the depth shadow. *(Integer)*

Bias

How far geometry is offset from itself when rendering into the depth shadow (increase this value to reduce shadow acne at the expense of shadows separating from their casters). *(Float)*

Ground Shadow Weight

The opacity of the ground shadow. Higher numbers result in a darker ground shadow. *(Percentage)*

NOTE: the ground must be visible for shadows to appear on it.

Manipulator

Mode

- **None** - Objects in the scene cannot be manipulated. (*Enumeration*)
- **Translate** - Objects in the scene can be translated by using the manipulator. This does not include any part of the tree model itself. Use node editing to move individual nodes based on their properties. (*Enumeration*)
- **Rotate** - Objects in the scene can be rotated by using the manipulator. This does not include any part of the tree model itself. Use node editing to move individual nodes based on their properties. (*Enumeration*)
- **Scale** - Objects in the scene can be scaled by using the manipulator. This does not include any part of the tree model itself. Use node editing to move individual nodes based on their properties. (*Enumeration*)

Coordinate System

- **Global** - Manipulation is relative to the world coordinate system. (*Enumeration*)
- **Parent** - Manipulation is relative to the parent object's coordinate system (currently the same as global). (*Enumeration*)
- **Local** - Manipulation is relative to the selected object's coordinate system. (*Enumeration*)

Size Scale

Scales the size of manipulators in the 'Tree Window'. (*Enumeration*)

Show Node Manipulator

When enabled, a manipulator object is overlayed on top of selected nodes for quick edits to common properties. (*Boolean*)

Frustum

Near Clipping Plane Scale

Near and far clipping planes are calculated based on scene extents. Use this value to scale the computed near clipping plane value. (*Float*)

Far Clipping Plane Scale

Near and far clipping planes are calculated based on scene extents. Use this value to scale the computed far clipping plane value. *(Float)*

Fog Start

The percentage between the near and far clipping plane where fog will begin. '1' = no fog, '-1' = always fogged, '0' = linear. *(Percentage)*

Fog Exponent

An exponent for the fog decay. Lower numbers will pull the fog toward the camera, and higher values will force the fog transition out further. *(Float)*

Viewport

Layout

- **One** - Show a single view of the scene in the 'Tree Window'. *(Enumeration)*
- **Four** - Show all four views of the scene. *(Enumeration)*
- **Two (over under)** - Show two views of the scene, one on top of the other. *(Enumeration)*
- **Two (side by side)** - Show two views of the scene, one beside the other. *(Enumeration)*

Camera FBX File

An external 'FBX' file that contains cameras to be used in the tree window. Any cameras found in this file will be added as an entry in the "current window" pulldown. Animation of the camera can be previewed using the 'Timeline' bar. *(File)*

Background Image

An image file on disk to display as the background of each viewport window. The way the image is displays is controlled by the 'background image style' property. *(File)*

Background Image Style

- **Full Frame:** The background image will take up the entire frame, and portions of the image may not be visible since the image is fit to the shorter dimension. *(Enumeration)*
- **Letterbox:** The background image will be completely visible (fit to the longer dimension) with "letterboxing" visible outside of the shorter dimension. *(Enumeration)*

- **Stretch:** The background image will be stretched to take up the entire frame, without regard to its original aspect ratio. (*Enumeration*)
- **Disabled:** The background image will not be visible. (*Enumeration*)

Background Color

Color of the background. (*RGBA*)

Grid Lines Color

Color of the grid lines. (*RGBA*)

Scribe Color

Color of the “scribed” rendering effect in the 'tree window'. Semi-transparent colors can be used for less obtrusive lines. (*RGBA*)

Show Overlay

Toggles the text information overlaid in the 'Tree Window'. (*Boolean*)

Show Light

Toggles the visibility of the light (it is always on). (*Boolean*)

Show Fan

Toggles the visibility of the fan. (*Boolean*)

Show Height

Toggles the visibility of the height indicator. (*Boolean*)

Show Axis Indicator

Toggles the visibility of the axis indicator in the tree window. (*Boolean*)

Show Ground

Toggles the visibility of the ground plane. The ground plane can receive shadows, and will cut through any geometry going below zero. (*Boolean*)

Show Grid

Toggles display of the grid on the ground plane. (*Boolean*)

Grid Spacing

Sets the distance between grid lines. *(Integer)*

Reset To Defaults

Restores all viewport properties to their default values. *(Function)*

Screenshot Safe Frame

Show

Renders a red box in the tree window depicting the region that “Export tree image...” and “Export material...” will use when executed. *(Boolean)*

Width

The width used when computing the aspect ratio of the safe frame (the actual width of the screenshot is determined on the export dialog). *(Float)*

Height

The height used when computing the aspect ratio of the safe frame (the actual height of the screenshot is determined on the export dialog). *(Float)*

Miscellaneous

Check for OpenGL Errors...: Query and report OpenGL errors each time the scene is drawn. *(Boolean)*

Screenshot Assist

Enabled

When checked, anything rendered as a leaf will be subject to hue, saturation, value, and normal modification subject to the properties below. *(Boolean)*

Seed

The random seed used to control color variation. Change this to change the variation pattern.
(Integer)

Variation:Hue

Sets the amount of hue variation on each leaf. (Float)

Variation:Saturation

Sets the amount of saturation variation on each leaf. (Float)

Variation:Value

Sets the amount of value variation on each leaf. (Float)

Perspective Camera

Navigation Type

- **Standard:** Orbit the view by dragging the pointer with the left mouse button down. Pan by dragging with the middle mouse button down. Zoom using the wheel or dragging with both the left and right mouse buttons down. The up vector is always maintained in this mode.
(Enumeration)
- **Trackball:** Same as standard, without the up vector restriction. (Enumeration)
- **Traveller:** Navigate the scene in a more first person style. Left button dragging equals walk forwards (up), backwards (down), and rotating (left to right). Middle button dragging equals panning. Left and middle dragging equals free look. (Enumeration)

Translation Scale

Scales all navigation movement (panning, walking, zooming). (Float)

Rotation Scale

Scales all navigation rotating (looking). (Percentage)

Grid Size

How many units are covered by the grid in perspective projections. (Float)

Field of View

The field of view of the viewer. (*Float*)

[Read our blog >>](#)

- [Home](#)
- [Company](#)
- [3D Animation Software](#)
- [3D Tree/Plant Library](#)
- [Accolades](#)
- [Documentation](#)
- [Contact](#)
- [Privacy Policy](#)
- [Terms & Conditions](#)
- [Site Map](#)
- ©2017 IDV, Inc. All Rights Reserved.
- [Questions?](#)

