

Reflective Radiance for 3Delight: Instructions

Reflective Radiance for 3Delight simulates real-world lighting as colors and light from nearby objects bounce onto each other. Similar to Iray, position your lights as you would in the real world. You have the ability to control the amount of light bouncing and occlusion level separately. All lights are easily adjusted using settings that are familiar.

You can use scene props or plane primitives (just out of camera range) to bounce light around the scene.

There are 23 presets that use a combination of distant lights, reflective, and image-based lighting to depict different times of day, weather conditions, ground cover, and alien planets. Feel free to use any standard DAZ light in addition to or instead of the spotlights or distant lights included.

There are eight emissive light shaders that turn any surface into a light source when used with the Reflective Light. Turn the bounce level up on this light for the full effect.

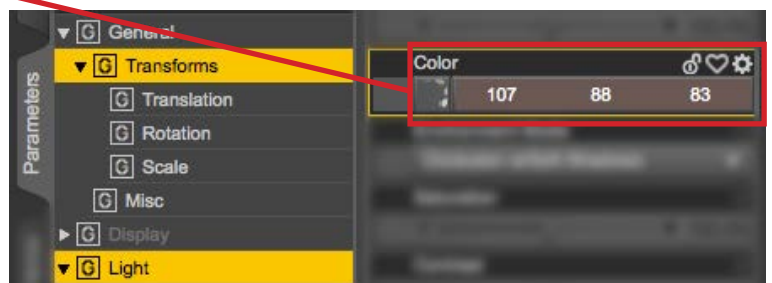
If your renders are getting hung up or stuck, nine adjustment shaders are included to help convert surfaces for speed. These adjustments do not have maps, they merely convert surfaces. Minimizing opacity/alpha maps will also help to speed up your renders.



Step by Step:

1. Compose a new scene or load an old one
2. Load one of the RR3 Light Presets and position the main distant light, spotlights, or key spotlight
3. In this initial stage of positioning the main light source your test renders and previews will happen quicker if you turn off the Reflective and UE2 lights
4. Test renders in the Aux Viewport. Once your main light is where you want it turn the Reflective and UE2 lights back on
5. Test renders in the Aux Viewport. If using AoA shaders, Ubersurface, or there are many opacity maps (such as used with hair) it may take some time to show a preview.

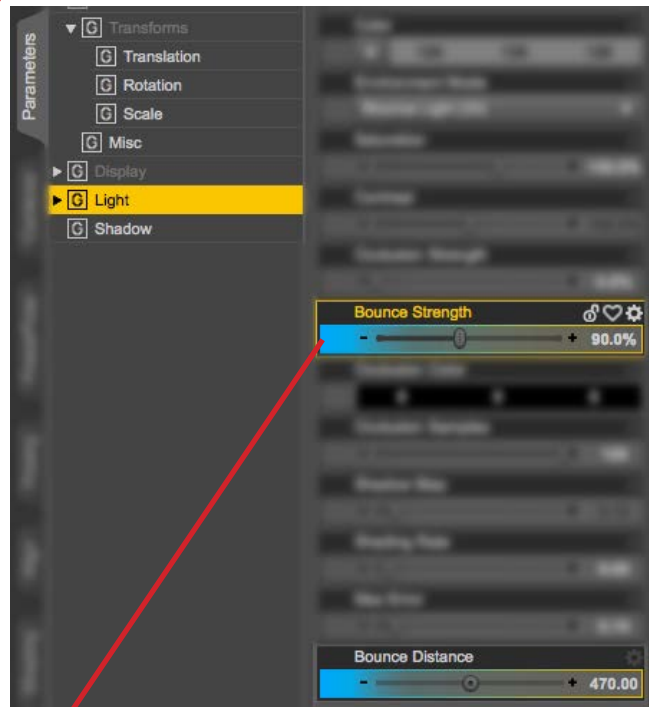
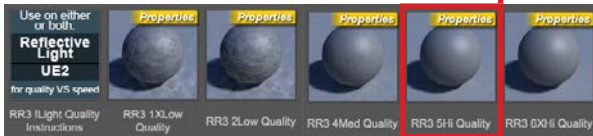
From here change your lights and do full or spot renders as needed. The lights are set up to work well together in outdoor scenes but depending on your props and figures used you may want to make adjustments. If creating an indoor scene and the light is coming through a doorway or window you may need to turn up the main and specular light to 200%. An indoor scene might also require adjusting the color of the UE2 light since sky colors will most likely not be present. You can adjust the diffuse color for a small change or choose color/image/none (and change the color to a dark gray) in parameters tab for a bigger adjustment.





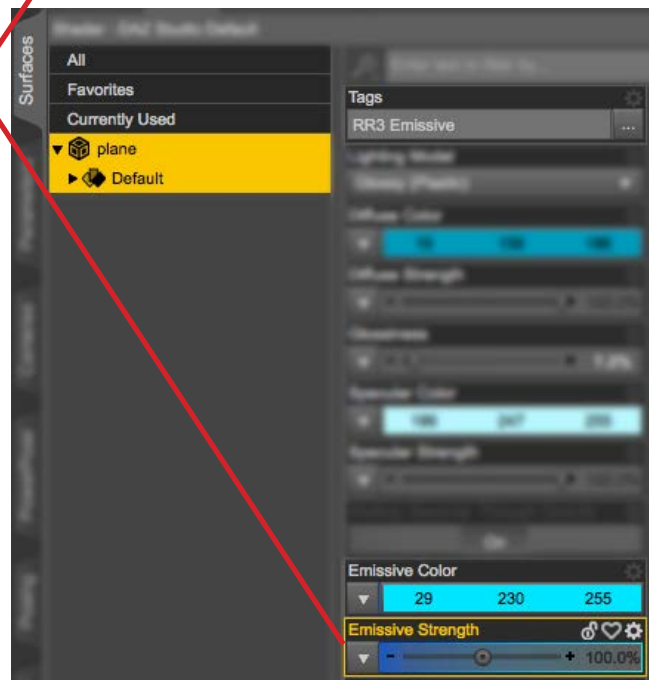
The Reflective Light:

Change the level of bounce and the bounce distance in the parameters tab. Increasing gloss and specular values can provide more color bounce. Use quality level presets to adjust the speed of your renders. You can start with a low quality setting to test your renders. By default the lights are set to 6XHi Quality. In most scenes with a decent amount of texture the 5Hi Quality setting will work fine. These settings can be applied to either UE2 or Reflective Light. Try turning off the UE2 for more dramatic renders and speeding up render time.



Emissive Shaders:

The intensity is controlled by the emissive channel in surfaces tab but the main effect is ruled by the bounce level of the Reflective Light. These emissive shaders work best to cast light as well as glow in low to medium light situations.



Light Presets:

Several IBLs are included that adjust the color of light for different times of day. These images also have a color applied to the diffuse channel so you can adjust to your liking. These UberEnvironment2 Tif images project sky, horizon, and ground colors into your scene for even more realism. The presets that start with "Day" (grass, brown, and snow) represent the different ground surfaces in your scene so match these lights up with your ground props for more realism.

Shaders, Surfaces, and Render Time:

Depending on the props and figures in your scene you may experience longer render times and previews in Aux Viewport. Other reasons for very long renders or the render getting hung up include using the Ubersurface shader, AoA shaders, and items with opacity/alpha maps (even with opacity at 0). If you want to convert Iray surfaces for 3Delight or your render stalls on a certain spot it might be best to convert the surfaces to the DAZ Default shader presets included. You don't have to use these shaders, they are personal preference and for troubleshooting.

Surface Adjustments explained:

- **RR3 DAZ Default Clear Reflective.** Use this on eye moisture, cornea, eye reflection, and glass
- **RR3 DAZ Default DarkSkin or Leather.** Also good for dark wood and fabric
- **RR3 DAZ Default LightSkin or Wood.** Also good for light fabric and plastic
- **RR3 DAZ Default Matte and Stone.** Could also be used for paper and old wood
- **RR3 DAZ Default Nails or Bone.** Would also work well for glossy plastic and painted surfaces
- **RR3 DAZ Default Reflective.** Good for metal, opaque glass, and liquids
- **RR3 DAZ Default SemiGloss and CeramicTile.** Use on polished wood and old metal
- **RR3 Occlusion Off.** Opacity maps on plants and hair (for instance) are the main reasons for a render to stall. This preset turns it off. It means there will be no bounce light or occlusion on these items
- **RR3 !DAZ Default** (for everything else) Convert surfaces to white (anything not covered above). A good starting point for ambient surfaces



For troubleshooting a stalled render or to speed up a render:

- **Use hair and/or plants with no opacity maps (Opacity maps are the #1 Resource Hog)**
- **Use the “Occlusion Off” shader**
- **Simplify your scene. More props (more polygons) means longer render times. Unless the object is used for bounce- hide or delete it—if it is out of camera range. You might even try reducing all surfaces inside the mouth to 0% opacity if the mouth is closed**
- Turn off cast shadows for that item
- Turn off Subsurface for the AoA surfaces or Ubersurface
- Render the hair and/or plants in a separate scene and combine in image editor

You'll experience quicker renders if your scene uses all DAZ default surfaces and no opacity masks, architectural renders being a good example. The render times for most of the promos was between 30 minutes and 2 hours on an IMac with no updated hardware.

You can use plane primitives (just out of camera range) to bounce light back into the scene or project light when an emissive shader is applied.

