## For new and newish Blender users:

## Blender Render vs Cycles Render

(How to tell the difference when following tutorials)

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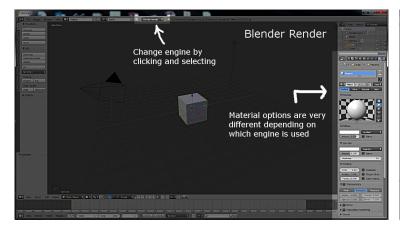
There I was, happily following along a nifty Blender tutorial, thinking things were going well. Then we got to materials and it all fell apart.

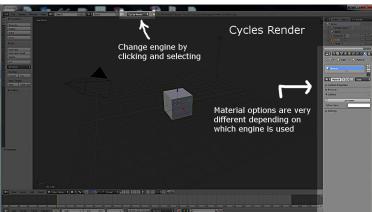
"With the object selected, click on the **Materials** button in the **Properties** window and press the **New** button."

Wait... I clicked on the **Materials** button in the **Properties** window, but there isn't a **New** button. I see a **Use Nodes** button, but I see no **New** button. So what's going on?

As a longtime Blender user, I recognize immediately that the tutorial is using the older **Blender Render** engine instead of the newer **Cycles Render** engine. I had Blender set for the Cycles engine. This could be a frustrating gotcha for someone just starting out.

Blender has two primary means of calculating what it needs to draw images and image frames for animation. This means there can be large differences in the rendering options and settings. It also means large differences in how materials and textures are set up and applied within the scene.





The older Blender Render materials are configured completely using the panels in the Properties windows. The newer Cycles materials use a node system which has an entirely separate screen for setting up all material and texture options. At first the Cycles materials may seem intimidating to learn, but they are extremely customizable in ways not possible with the Blender Render materials.

For fulldome planetarium folks like myself, and for folks rendering for VR, the render options available only through the Cycles engine make it well worth learning.

If following a tutorial and the materials language doesn't match what is on your screen, check to see which render engine is being used.

## Resources:

Blender download: http://www.blender.org/download/Blender user manual: http://www.blender.org/manual/

Interesting (nerdy) discussion on Cycles vs. Blender render:

http://blender.stackexchange.com/q/5820/34258