- BrightnessOnly
- ReliefFactor

BrightnessOnly, which takes no parameters, applies shading in WHAT WAY? ReliefFactor sets the amount of exaggeration of the shading (for example, to make hills appear higher). According to the OGC SLD specification, a value of around 55 gives “reasonable results” for Earth-based datasets:

```
<ShadedRelief>
        <BrightnessOnly />
        <ReliefFactor>55</ReliefFactor>
</ShadedRelief>
```

The above example turns on Relief shading in WHAT WAY?

OverlapBehavior

Warning: Support for this element has not been implemented yet.

Sometimes raster data is comprised of multiple image sets. Take, for example, a satellite view of the Earth at night (http://apod.nasa.gov/apod/ap001127.html) . As all of the Earth can’t be in nighttime at once, a composite of multiple images are taken. These images are georeferenced, and pieced together to make the finished product. That said, it is possible that two images from the same dataset could overlap slightly, and the OverlapBehavior element is designed to determine how this is handled. There are four types of OverlapBehavior:

- AVERAGE
- RANDOM
- LATEST_ON_TOP
- EARLIEST_ON_TOP

Given the situation mentioned previously of the image composite, it is possible to style each image so as to have an outline. One can even set a fill color and opacity of each image; a reason to do this would be to “gray-out” an image. To use ImageOutline, you would define a <LineSymbolizer> or <PolygonSymbolizer> inside of the element:

```
<ImageOutline>
        <LineSymbolizer>
        <Stroke>
                        <CssParameter
name="stroke">#0000ff</CssParameter>
        </Stroke>
        </LineSymbolizer>
</ImageOutline>
```

The above would create a border line (colored blue with a one pixel default thickness) around each image in the dataset.

Previous: Labeling (labeling.html)

Next: SLD Extensions in GeoServer (../extensions/index.html)