

HDRI (HIGH DYNAMIC RANGE IMAGING)

The bane of photographers since almost day-one of the medium is the limited dynamic range it can capture. Unlike the eye/brain system that allows for local adaptation to shadow and highlight areas, film or sensor can only record a fraction of the range of our human perception. A wide array of exposure and development techniques was tried with varying degrees of success in the film world to solve it. Why try? Because sometimes something lurking in the deep shadows or hiding in the bright highlights is the visual key to the whole image but shooting to capture it loses the environment that tells the rest of the story. But with digital technology, we have a very workable solution and that effort can be simple or extensive in creating images that would have been impossible to produce just a few years ago

Subject

Any subject but it needs to have an extensive inherent dynamic range. Something with bright highlights and deep shadows is the requirement so a bright sunny day will be required for the shooting.

Procedure

Find and compose your image as carefully as you would any other. You will need to shoot from a tripod for this shot. (You can check one out of you do not own one.) Following the instructions in class, expose a sequence of images ranging from one for the highlights down to one for the shadows in 2-stop increments. This will take 3-5 exposures generally. Also, in case one of the above increments is not an exact match, make one proper exposure as if you could only shoot a single frame.

1. Using Photoshop or Photomatix, make an HDR/tonemapped file. Bring that tonemapped file into Photoshop and complete the editing.
2. Take the proper single frame and make a finished image file as well as you can.
3. Take the proper single frame and using layers attempt to recover highlights and shadow detail as best you can.
4. Take the proper single frame RAW file and make a simulated HDR file (if you have Photomatix (or a trial version) available.)

When completed, flatten the files if they are layered, convert them to sRGB and 8-bit mode; resize it to 100 PPI and with the maximum dimension set at 1,000 pixels.

The shots made from the above numbered instructions should be re-Named/Saved-As "**yourname HDRI 01 (through 04).jpg**" using the sequence above. You may not have an 04 version if you do not have Photomatix available.

To Turn-in

4 files labeled as above (or three if you do not have Photomatix) as an attachment to Blackboard in the HDRI assignment section.

Grading

Grading will be based on the grading form. Download a copy for your reference and/or read the online material on the grade form and what the criteria mean.
