

Introduction to Post Processing

What is Post Processing?

- Anything that happens after you click the shutter
- Some processing can be automatic
 - Camera using mode settings
 - Camera conversion to JPEG
- Some can be manual
 - Usually performed outside the camera

Note: “camera” means DSLR, mirrorless, point & shoot, or cell phone

What Your Camera Does When You Press the Shutter

- Camera sensors are designed to capture light in set frequency bands, deciding what visible light to capture.
 - The design also sets the available dynamic range of the image.
 - What is captured is not exactly what you see
- Sensors change waves of light into numbers.
 - Think of a set of buckets – when an object smaller than the bucket is in the scene, it can create unwanted patterns. Cameras blur incoming light to minimize the effect.
 - Google “how do cameras deal with moire patterns” to learn more.

What Your Camera Does After You Press the Shutter

- If you use automatic modes, the camera manufacturer has decided how to end up with the “best” look
 - Some modes set shutter speed or aperture, modifying how the light is captured
 - Some modes modify the captured data – like a Vivid mode
 - Some modes do both, especially on a cellphone

What Your Camera Does After You Press the Shutter

- If you shoot in JPEG, the captured data is changed into pixels, and potentially compressed – which throws away some dynamic range info
 - Camera settings of “Large” minimize compression
- It is important to note that Raw files don't have viewable pixels. What you see on the camera display is a conversion of raw data to pixels

Why Do Post Processing?

- If you shoot in Raw, post processing is required to change the raw data into viewable pixels
- Whether raw or JPEG, post processing can be done to:
 - Change the size/aspect ratio of the image
 - “Fix” what the camera has done to the image
 - Make a “better” photo
 - Create art
- Let's look at some examples

Change the Size or Aspect Ratio

- Resizing – this refers to changing the size in KB or MB of the image file
 - Usually done to post the photo to social media, submit to the club website, or to email
- Cropping – this refers to changing the aspect ratio to modify the dimensions of the image
 - Usually done to either change the image composition or in preparation for printing

Cropping



“Fix” What the Camera Did

- Examples include:
 - Modifying dynamic range,
 - Sharpening to remove lens blur
 - Removing a color cast caused by lighting conditions

Modify Dynamic Range and Color Cast



Make a Better Photo

- Sharp through out the field of view



Make a Better Photo

- Fix a lighting problem

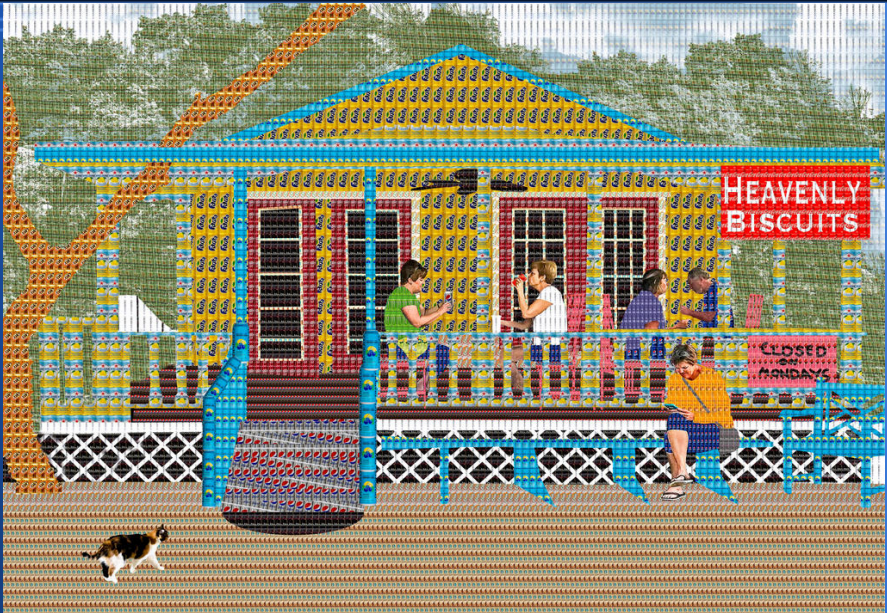


Make a Better Photo

- Set a mood



Create Art



Post Processing

There are no right answers.
You decide what to do.

What We Will Do in These Meetings

- Present basic concepts in a software neutral way
 - There is no “best” software to use
 - There are simple programs to get started with and complex programs to do more
 - Most (not all) club members use Lightroom / Photoshop
 - Elements has more built in help, some restrictions compared to Lightroom, some abilities beyond Lightroom
 - Non-Adobe options include Affinity, Capture One, Luminar Neo,
- Round robin show and Q&A

Next Month

- Topic will be “fixing what the camera did”
- If you want, you will be able to show a photo and ask questions
- In the meantime, email me with any questions:
ddnagy@gmail.com