THOUGHTFUL NATURE PHOTOGRAPHY

(It's not about your gear.)
CLASS OVERVIEW

• Today: The Ugly Technical Details That you Need to Know

• Week 2: Understanding Landscape

• Week 3: Wildlife

• Week 4: Night Photography and Post-Processing
“YOU TAKE BEAUTIFUL PHOTOS, YOU MUST HAVE A REALLY GOOD CAMERA.”
A PHOTOGRAPHIC SECRET

- Photographers love gear.
- We love to argue about Canon vs. Nikon.
- We love to discuss the virtues of different apertures and ISOs.
- We love to chat about shutter speeds and tripods, wide angles and telephotos.

And Yet None of that Has Anything to Do with Making Better Images.
IT’S TIME TO FORGET ABOUT GEAR
BUT FIRST... WE NEED TO TALK ABOUT GEAR

- Types of Cameras
  - Phones
  - Point and Shoots
  - Mirrorless
    - DSLR - Digital Single Lens Reflex Cameras
- Lenses
  - Wide Angles ~8-35mm
  - Standards ~35-70mm
  - Telephoto >70mm
SENSOR SIZES

“Full Frame” (35mm equivalent)

APS-C (1.5-1.7x crop)

4/3 or micro 4/3 (2x crop)
A NOTE ON MEGAPIXELS

• Pixels are the light sensitive points on a sensor.

• The more pixels, the higher resolution the final image.

• BUT - It’s the quality more than the quantity that is important.

• Too many pixels on too small of a sensor will lead to lots of digital noise and pixelation,

• Megapixel wars have led to low quality in some cases.

In short, lots of megapixels does NOT mean high quality.
AN UNFORTUNATE TRUTH:
YOU NEED TO UNDERSTAND YOUR CAMERA
IN PARTICULAR THESE THREE THINGS:
APERTURE (F-STOP)
SHUTTER SPEED
ISO
• Aperture Plays Two Roles:
  • Controls Light
  • Controls Depth of Field
• Smaller Number = Larger Opening = More Light
• “Faster” Lenses open further
• “Faster” lenses are bigger
• The faster the lens, allow faster shutter speeds
• Depth of Field: The Amount of the Image from front to back in focus.
• Smaller Number = Larger Opening = More Light = Shallow Depth of Field
• Larger Number = Smaller Opening = Less Light = Deep Depth of Field
SHALLOW DEPTH OF FIELD