## **Nightscapes Checklist**

Setup

Camera Custom Functions and Presets

Learn Infinity Focus position

Mirror Lockup (no?)

Long Exposure Noise Reduction (yes?)

High ISO Noise Reduction (yes?)

LCD Brightness (Dimmer)

Auto Off (eight minutes +)

Review time (four seconds +)

Picture Quality/File Type (RAW + Large)

White Balance (Tungsten—3400-4400)

Function Dial (Manual)

Image Stabilizer (off)

Auto Focus (off)

Lens Hood (yes), Filter, (no)

Set Self-timer to 2 seconds or program remote release)

Mount Camera

Lock everything that can be locked on tripod

Tie down straps, remote, etc.

## Taking an Image

Check Setup

Focus

Aim at bright star (anywhere in sky)

Wide Angle/viewfinder/center and focus

Tele Angle/viewfinder/center

Imaging Zoom Setting/LiveView-LCD Screen/Loupe

Find star/Position Magnify Box,

Magnify by 10

Focus Manually

Remove color fringe

Test Image (Composition)

Aim at subject

Shutter at 10 seconds (more if needed)

Widest aperture (F smallest possible number)

Highest ISO available (6400/12800 is OK)

Take and Evaluate Image

composition

sweep corners

lens aberrations at full aperture

fill frame

local lights/distractions, etc.

Adjust/Repeat until happy

Lock Tripod

Test Image (Exposure)

Apply "Rule of 200" for shutter time

Exposure time=200/focal length

Widest aperture (F smallest possible number)

ISO 800

Evaluate Image

Histogram—one third across

Star shapes—magnify and check corners

Adjust ISO higher if possible

Adjust/Repeat until happy

**Final Shots** 

Set self timer or remote release.

Take several images at any given setting

Do both Horizontal and Vertical Alignment

Vary ISO/Time/Aperture as you like

Take Notes

For Every Exposure:

Take a deep breath

Press shutter/remote button

Wait for self timer (if no remote)

Wait for shutter

Wait for "ICNR" time if used

Review

Light Painting (Highlight foreground)

Diffused Flashlight (or Cellphone)

Wave and move around to avoid harsh shadows

**Experiment** 

## **Processing**

Do Not Work on Originals

File Explorer or Image Viewer

Fix

Move sliders to make pleasant picture Change Exposure, Color Balance, etc.

These suggestions are for those just starting in Nightscape photography with basic equipment and experience.

Experiment and change as you get comfortable.



Resources

Web: The World At Night twanight.org
Web: Wally Pacholka astropics.com
Web: Any Search Engine for Nightscape Photography

Classes: dennismammana.com

**Print:** Photography Night Sky, Jennifer Wu/James Martin, Mountaineer Books **Good People:** Riverside Astronomical Society rivastro.org **Software:** Helicon Filter heliconsoft.com (and many others)

**Presenter:** Alex McConahay alexmcconahay@gmail.com