

OBSERVING 101 & SKYWATCHER AWARD

(Note, if your location does not permit you to make some of these observations either due to light pollution or obstructions, note that you tried in your observing notes with the reason you could not make the observation, and it will count.)

1. Identify and start following one or more sources of the current sky and astronomy news (such as the Reflector, Sky and Telescope, Astronomy, or a webpage such as Earth and Sky, CAAS or Facebook public page, or ANSA Group page, etc.)
2. Find and learn to use a planisphere or planetarium program.
3. Assemble an observing kit (Red or amber flashlight, some means of recording observations, some form of chart, bug spray, and extra clothing).
4. Witness a sunset near the new moon and note where on the horizon it occurs. Describe the moon if you can see it.
5. If up in the Evening, observe Mercury and/or Venus along with any other planets that are up. Note where they are in the sky, West, East, or near the meridian (center), and think about what that tells you about whether we are approaching or past conjunction.
6. Draw an imaginary line from where the sun has set through any planets and the moon to visualize where the ecliptic lies. Notice whether the planets twinkle and record their color.
7. Find North and then Polaris. Record how many of the stars of the little dipper you can see.
8. Identify the circumpolar asterisms Big Dipper, Little Dipper, and Cassiopeia (requires a moderately dark sky).
9. Track the lunar phase from new to full every clear night, noting how the rise time changes in relation to sunset as the days go by.
10. Note the light and dark areas of the moon and find the lady, rabbit, or man in the moon.
11. Near full moon, if you are using binoculars, look for the light-colored rays coming from some of the lighter-colored craters.
12. Learn these terms: zenith, meridian, celestial equator, solstice, opposition, and conjunction.
13. Identify the current seasonal asterism (the Summer Triangle, Winter Hexagon, Spring Diamond, or Fall Square). Note the names and magnitude of the stars that form the asterism, and trace out each constellation each star belongs to as best you can. (requires a moderately dark sky.)
14. Find a major constellation, such as Orion (late Fall through Spring) or Sagittarius (Summer), and observe as directed in the program.
15. Note the change in the position of objects after at least one hour's time.
16. Identify ten 1st magnitude stars.
17. Survey your home's exterior lighting and qualify for a dark-sky-friendly certificate. (10)
18. Use Globe at Night to determine the limiting magnitude of your observing site or home.

Congratulations, you earned your sky wings and acquired the basic skills to explore and witness a whole new realm of nature and your place in it.