

Astronomy in room 309
with Professor David Cohen
March 1, 2006

The Moon

You can see the moon up in the sky on many nights.

The moon shines because the Sun's light reflects off it. But only part of the moon is lit up at any one time, and so we see the moon only partly lit.



We talk about the moon's **phases** when we talk about what part of it is lit up. Over about one month, this is how the moon's appearance changes:



Activities for you to do with your family:

Go outside tonight, right after sunset. Can you find the moon? What phase is it in? Where is it?

Show it to your parents!

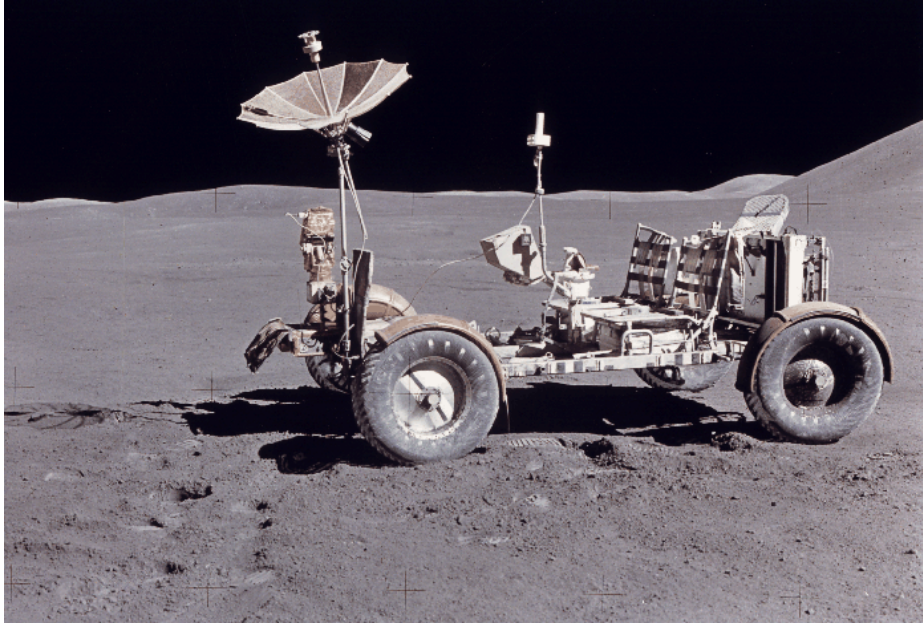


Is it a **crescent**?

Go out again in a few nights (maybe on Friday or Saturday). Where is the moon now? Does it look different? Is its phase different?

Does it make sense that its phase is changing (is it getting more full and less like a crescent?) as it's getting farther away in the sky from the sun (or the place where the sun just set)? Think of the ball and the light...

The moon is far away – 100 times farther away than California is from Swarthmore. But people have traveled to the moon in spaceships:



You can check these out on your computer, with your parents -
Information and pictures about the moon and astronomy:

http://aa.usno.navy.mil/faq/docs/moon_phases.html

<http://www.nineplanets.org/pxmoon.html>

<http://www.astro.wisc.edu/~dolan/java/MoonPhase.html>

http://www.calculatorcat.com/moon_phases/moon_phases.phtml

<http://antwrp.gsfc.nasa.gov/apod/astropix.html> (Astronomy Picture of
the Day – check out their “search” function)

Professor Cohen’s website:

<http://astro.swarthmore.edu/~cohen/>

<http://astro.swarthmore.edu/~cohen/public.html>