Moon 101

Crocker High School

Skyla Cowell Isaiah Dean Emilie Evans

Eligh Newcomb Sarah Overby Dillon Porter

Jonathan Routh Morgan Wall Logan Wright

Images

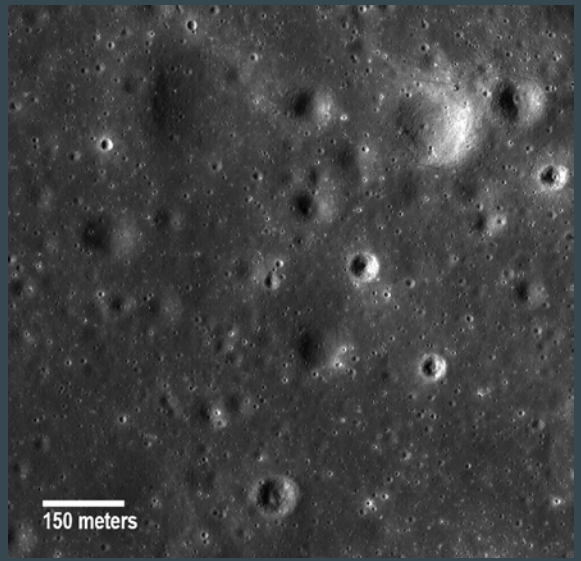


Image 1

Image 2

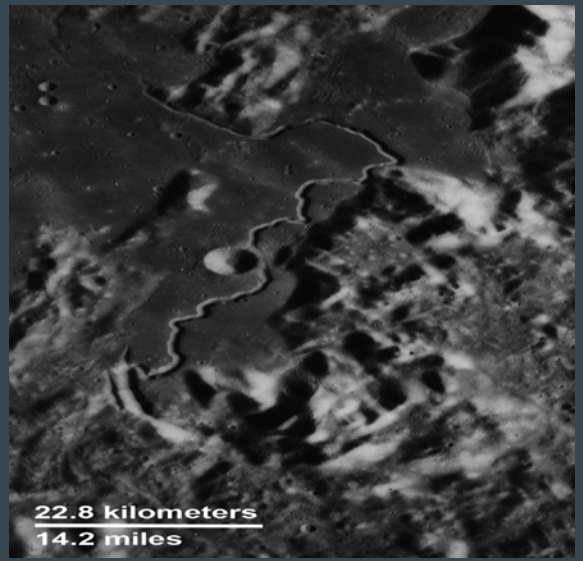


Image 3

Questions

What geologic features are present?

How did they form?

How old are they relative to each other?

How do you know that?

Moon Formation Hypothesis

The Giant Impact Hypothesis/Theia Impact

The Fission Theory

Capture Theory

Sister Theory

Formations on the Moon

The different formations on the moon consist of the following:

- Simple Craters
- Complex Craters
- Central Peak Basins
- Peak Ring Basins
- Multi-ring Basins

Craters

How do craters form?

Craters form when objects hit the surface of the moon and some of the impacts may have been harder or softer than others.

How can you tell the age of a crater?

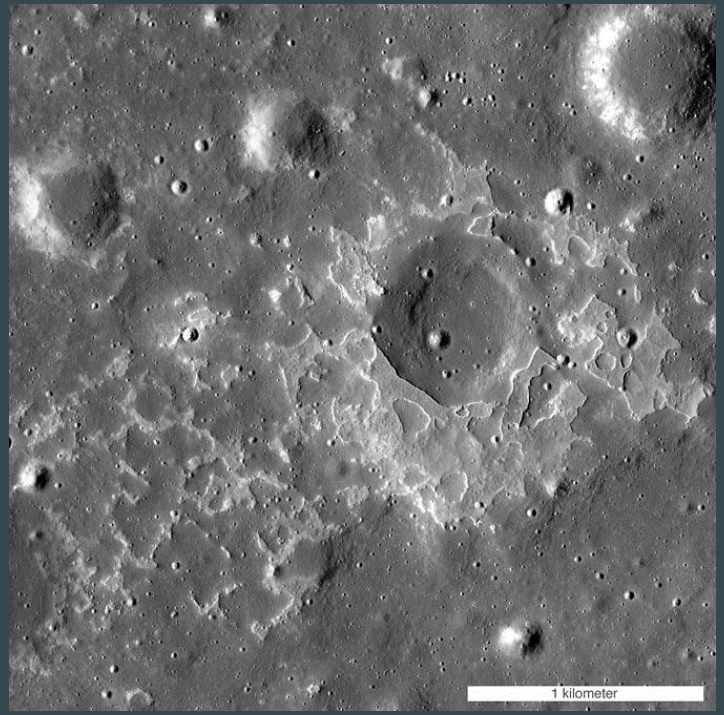
You can tell if the age of a crater by the crater’s appearance, how many craters are inside of the crater, if the crater is lighter or darker, if the crater is rounded or not, and the size of the crater.

Lunar Volcanism

The moon is no longer volcanically active

Vast plains of basaltic lavas cover much of the moon’s surface.

Although there are no obvious, towering volcanoes, there are many volcanic features such as dark mantling deposits, small volcanic domes and cones, and sinuous rilles.



Mare

Mare is a large, dark, basaltic plain on the moon, formed by volcanic eruptions.

Lunar Mare (Maria; plural) comes from the early ages of the moon.

Lunar mare covers sixteen percent of the lunar surface.

Lunar Rilles

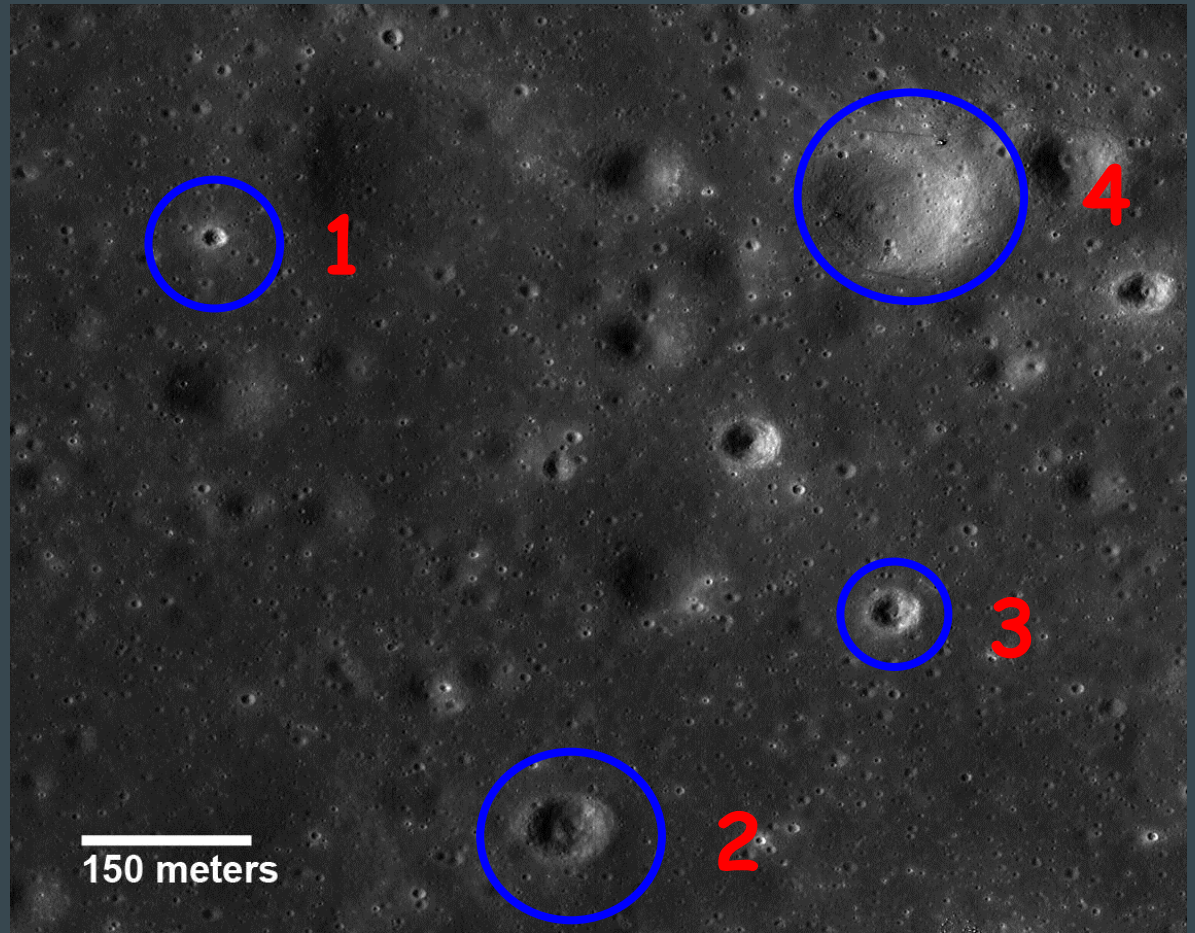
Lunar rilles are long, narrow depressions in the moon’s surface that resemble channels.

They can be up to several kilometers wide and hundreds of kilometers in length.

Earth channels

Lunar Rilles

Image One



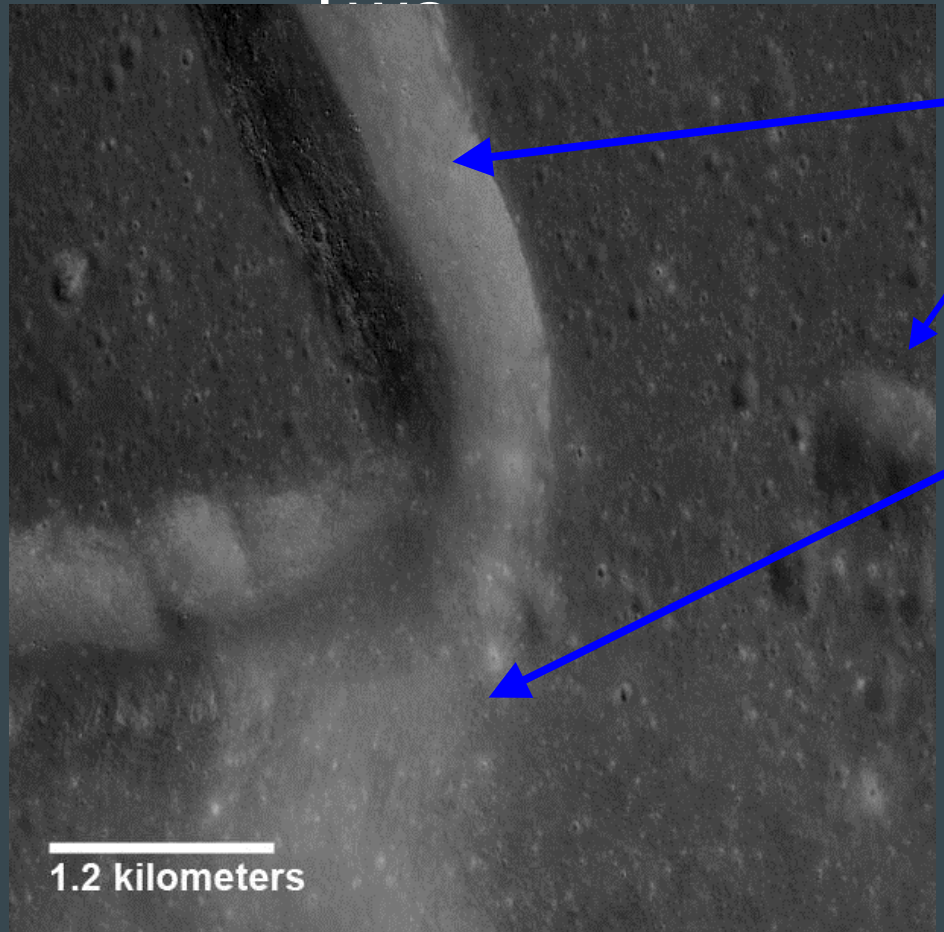
Formations Present:

- Simple Craters
- Complex Craters

Order of formation (oldest to youngest):

- Crater 4
- Crater 2
- Crater 3
- Crater 1

Image Two



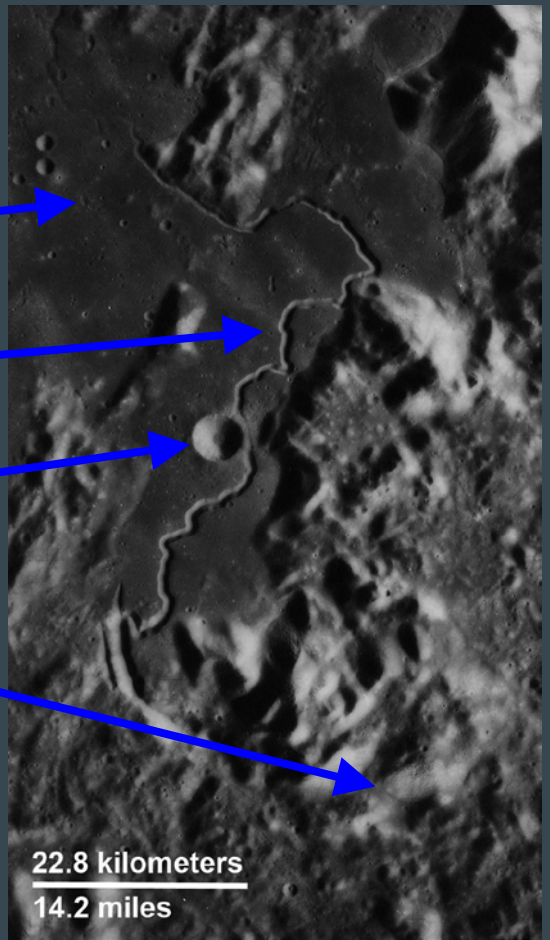
Formations Present:

- Rille
- Simple Crater
- Difference in soil composition

Image Three

Formations Present:

- Mare
- Lunar rille
- Cratering
- Highlands



Resources

http://www.lpi.usra.edu/exploration/education/hsResearch/moon_101/ImpactCratering.pdf

http://www.lpi.usra.edu/exploration/education/hsResearch/moon_101/LunarVolcanism.pdf

http://ser.sese.asu.edu/GHM/ghm_05txt.pdf