# Environmental Geology Case Study 2.1

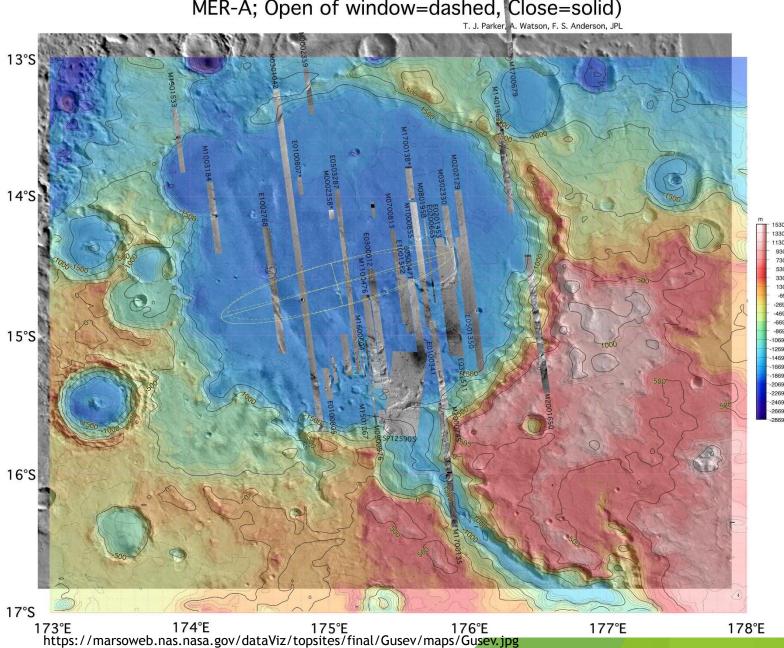
Search for Life on Mars



## Search for Water

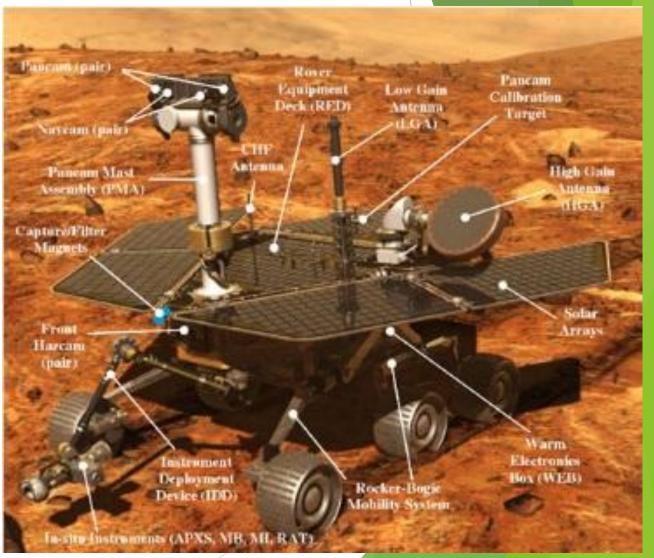
- Because all forms of life Earth require water
- Scientists believe
   Mars had surface
   water 3.8 billion
   years ago

# Gusev Crater Site (TCM-5 DeltaDOR, -2Day: MER-A; Open of window=dashed, Close=solid)



### Mars Satellites and Rovers

- Iron oxide minerals found in sediment layers
- Magnesium sulfate minerals in crater sediment
- Other minerals typically formed when mineral rich water evaporates



http://www.jpl.nasa.gov/infographics/infographic.view.php?id=10729

# Geologic Processes

- Cross bedding sediment deposition formations due to wind/water movement
- Ripple marks
- Subsurface water may flow to surface during seasonal warm times

