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| **Terrestrial Planet (and Lunar) Features Matrix** | **Earth** | **Venus** | **Mars** | **Mercury** | **Moon** |
| **Interior** | | | | | |
| Relative size (L/M/S) | *L (XL)* | *L* | *M* | *S* | *S (XS)* |
| Active geology now? | *Yes* | *Yes* | *Maybe?* | *No* | *No* |
| Magnetic field? | *Strong* | *No* | *No (Minimal)* | *Weak* | *No (Minimal)* |
| **Surfaces** – processes from the world’s distant past (~3-4 billion years ago) | | | | | |
| Craters visible from 3-4 billion years ago? | *No (erased)* | *No (erased)* | *Some* | *Yes (lots)* | *Yes (lots)* |
| Visible signs of ancient tectonics, lava flows? | *No (erased)* | *No (resurfaced)* | *Some* | *Yes – Maria and Scarps* | *Yes - Maria* |
| Visible signs of ancient erosion? (Source?) | *No (erased)* | *No* | *Yes (Water)* | *No* | *No* |
| **Surfaces** – processes from the recent past (~1 billion years) and ongoing processes | | | | | |
| Recent craters? | *Yes* | *Yes* | *Yes* | *Yes* | *Yes* |
| Recent volcanism and tectonics? (Specify) | *Plate tectonics, active volcanism* | *Active volcanism, some tectonics* | *Older volcanism and tectonics* | *No* | *No* |
| Recent erosion? (Source?) | *Yes (Wind, Water, Ice)* | *No* | *Yes (Wind)* | *No* | *NO* |

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|  | **Earth** | **Venus** | **Mars** | **Mercury** | **Moon** |
| **Atmosphere and Water** | | | | | |
| Substantial atmosphere? | *Yes* | *Yes* | *Yes (thin)* | *No* | *No* |
| Primary composition of atmosphere if present? | *Nitrogen, Oxygen* | *Carbon Dioxide, Nitrogen* | *Carbon Dioxide, Nitrogen* | *--* | *--* |
| Greenhouse effect? | *~30 K* | *~ 500 K!* | *~5 K* | *No* | *No* |
| Seasonal changes? | *Yes* | *No* | *Yes* | *No* | *No* |
| Surface liquid water? | *Yes* | *No* | *No* | *No* | *No* |