



## Lunar Quest Pre-Mission Vocabulary

### **CLC Terms**

Mission Commander – the person who is in charge of the astronauts onboard a space vehicle

Flight Director – the person who supervises a space mission from Mission Control

Simulator – an artificial environment created to resemble an actual place

Task Cards – a step-by-step set of written instructions for performing a job

Airlock – a device that permits the passage of people and objects between areas while minimizing the change of pressure and loss of air

Communication (COM) – means of sending or receiving information

Navigation (NAV) – the science of getting ships, aircraft, or spacecraft from place to place, especially related to the method of determining position, course, and distance traveled

Medical (MED) – relating to the science of medicine, or to the treatment of illness and injuries

Robotics (BOT) – a branch of engineering that involves the conception, design, manufacture, and operation of robots that can assist humans in a variety of ways

Rover (ROV) – a remotely operated vehicle that is an unmanned tool for exploring distant locations



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Geology (GEO) – the science that deals with the history of the earth and its life, especially as recorded in rocks

Biology (BIO) – the branch of science that deals with living organisms and their vital processes

Life Support (LS) – the components of a spacecraft that address the core needs of human life, including air, water, and oxygen supply

Space Weather (SW) – the variable conditions on the sun and in space that can influence the performance of the technology we use on Earth

### **Moon Mission Terms**

Lunar – related to the moon

Docking – joining with a space station or another spacecraft while in space

Translunar Injection – a maneuver that moves a spacecraft from orbit around the Earth onto a trajectory toward the Moon

Lava Tubes – cave formations made by lava flowing either above or below the surface

Moonquake – a quake or series of vibrations on the moon similar to an earthquake

Descent – an action of moving downward, dropping, or falling



## Lunar Quest Pre-Mission Vocabulary

Altitude – the vertical elevation of an object above a surface (such as sea level or land) of a planet or natural satellite

Satellite – an artificial body placed in orbit around the Moon, Earth, or another planet in order to collect information for communication

Orbit – the curved path an object follows as it revolves around a celestial body

Crater – a basin resulting from the collision of an object with a planetary surface

### **Job-Specific Terms**

#### **NAVIGATION**

Rendezvous – meeting at an appointed or designated place and time

Velocity – the speed at which an object is traveling in a given direction

Trajectory – the path an object takes when moving through space

Propulsion – the action of driving or pushing forward

#### **COMMUNICATION**

Encrypt – to convert information into a secret code that hides its true meaning

Decrypt – to make a coded or unclear message intelligible

#### **MEDICAL**

Nutrients – substances that promote growth, provide energy, and maintain life



## Lunar Quest Pre-Mission Vocabulary



### **ROBOTICS**

Programming – the act of providing instructions to a computer to perform a set of actions without direct human control

Program Nesting – an if-then scenario in which you program an instrument to follow instructions only when certain criteria are met (as in “IF it’s raining, THEN deploy umbrella”)

### **ROVER**

Terrain – the physical features of the ground or surface of an area

Rappel – descent from a place of high elevation to a lower one as from a cliff, using a rope or cable

Skylight – an opening in the roof or top of a cave or lava tube that exposes the subsurface

Tether – a line that is attached to an object or person to secure it in place

Motherboard – a circuit board containing the principal components of a computer or device with connections for other pieces to be slotted

### **GEOLOGY**

Geothermal – using the heat produced by a planetary body

Density – the amount of mass in a particular space, calculated by dividing the mass of something by its volume



## Lunar Quest Pre-Mission Vocabulary



### **BIOLOGY**

Radiation – energy that moves from one place to another as a wave or stream of high-energy particles

### **LIFE SUPPORT**

Air Pressure – the force exerted by air on a surface

pH – a scale used to specify the acidity or basicity of a liquid

### **SPACE WEATHER**

Voltage – the measure of electrical potential; the measure of how forceful electrons are pushed through a circuit

Current – the measure of the amount of flow of electrical charge

Solar Panel – a panel designed to absorb the sun's rays as a source of energy for generating electricity or heating

Irradiance – the amount of light energy from one thing hitting a square meter of another each second

Ammeter – an instrument used to measure electric current