Volcano Eruption

1. **Identify the sphere(s) this photo would be in and explain why.**

2. **Identify 3 types of interactions that might occur here.**

3. **Identify 3 types of interactions that humans might have here.**

4. **Identify potential animal and plant life that might live here.**

Potential Answers:

Atmosphere and geosphere and biosphere:

Biosphere:
• People living near volcanoes are at risk of lava, ash, and toxic gases that can be dangerous to their health.
• People living near volcanoes may be affected by air pollution caused by the emissions of volcanic gases.
• Volcanic eruptions can cause destruction to buildings, infrastructure, and people's homes.
• Volcanic eruptions can cause landslides and mudflows, which can destroy farmland and cause flooding.
• Volcanic eruptions can cause food shortages due to destruction of crops and livestock.
• Volcanic eruptions can also cause disruption of transportation and communication systems.

Geosphere:
• Volcanic eruptions can create new landforms such as lava flows, cinder cones, and ash deposits.
• Volcanic eruptions can change the landscape by burying existing landforms with lava and ash.
• Volcanic eruptions can release large amounts of heat energy, which can affect the climate of the area.
• Volcanic eruptions can trigger earthquakes and other seismic activity.
• Volcanic eruptions can cause changes in the soil composition, which can affect plants and animals in the area.

Atmosphere:
• Volcanic eruptions can release particles and gases into the atmosphere.
• Volcanic particles and gases can influence global climate conditions by reflecting and absorbing sunlight.
• Volcanic eruptions can cause the atmosphere to cool, which can cause changes in weather patterns.
• Volcanic eruptions can produce sulfur dioxide and carbon dioxide, which can lead to global warming.
• Volcanic eruptions can also release ash and particles into the atmosphere, which can reduce air quality.