

Station 4: Grinnell Glacier: Glacier National Park

Directions

1. As a group, read through the article “ Glacier National Park, Montana” to discover how glaciers like the Grinnell glacier form.
2. Go to <http://www.youtube.com/watch?v=Pg23W71L3Xo> and watch the “Grinnell Glacier and Features” video:
3. Answer the question on your station booklet for station 4. Be sure to include an explanation to your reasoning.

Glacier National Park, Montana

Article from: <http://www.nationalparkreservations.com/glacier-park-montana-1.php>

Nestled in the northwestern part of the Big Sky Country lies a place full of magic and wonder, known by most as Glacier Park, Montana. An area often referred to as "The Crown of the Continent," Glacier National Park is one of the most visually stunning areas in the United States.

Meticulously carved by ancient glaciers, the mountain horns, cirques, arêtes, hanging valleys, and moraines of this park stand in stark contrast to the vast expanse of land below. The geologic history of this area is as fascinating as its present day scenery.

This little corner of the world would not be what it is today were it not for the centuries of snow and ice that have fallen over Glacier Park, Montana. When more snow falls in the winter than melts in the summer, the layers of snow remain year after year, and glaciers are created. The top layer of snow weighs heavily, pressing down on the bottom layers of snow, slowly compacting them into ice. This bottom layer of ice eventually becomes flexible due to the intense pressure of the layers above it, and once this occurs (especially if it is on a downhill slope) it may slowly begin to move. Once this massive layer of ice and snow starts to move, it can then be referred to as a glacier.

Due to the ancient glacial movement that has occurred here in northwestern Montana, there exists unimaginably beautiful landscape formations in Glacier Park, Montana. When a glacier moves, it gradually picks up rocks and debris and begins to carry them along as it slowly slides down the mountainside. Eventually, the glacier is peppered with debris and resembles something like sandpaper-- full of rocks, boulders, and other natural items. Over the course of thousands of years as the glacier grinds its way downhill, landscapes such as huge U-shaped valleys, knife ridges and peaks, hanging valleys with waterfalls, and upper basins filled with glacial water are formed. These are the elements that have come together and composed such a beautiful symphony as Glacier Park, Montana.