

Name _____ Class _____ Date _____

Lateral Moraines

This image from eastern California shows some of the effects of a valley glacier. A glacier formed the tongue-shaped valley (C23-M8) that dominates much of this view. The steep, parallel ridges formed along the flanks of the advancing glacier. These ridges are called lateral moraines and are composed of the material that had been picked up and deposited by the glacier. These moraines merge at N8 forming a terminal moraine and show the furthest point reached by the glacier.

Lateral moraines can be quite large. The ridge at B19 is about 150 meters (500 feet) above the level of Walker Lake (D20).

1. What evidence is visible that suggests that the glacier made a series of advances, rather than one continuous move downhill? _____

2. Did the glacier originate within the visible area or further uphill? _____

3. From where did the material that makes up the moraines originate? _____

4. Where in this view can you see the traces of a second glacier? _____

5. Examine the small v-shaped valley at F8. Is it older or younger than the lateral moraine stretching from A21 to M8? Explain why you believe this. _____

(Continued...)

6. Why is the shape of the valley at G16 so different from the shape of the valley at F9? _____

7. What produced the deposits at F17 that hold back the waters of Walker Lake?

8. Another lake appears to have occupied the area below Walker Lake at H15. Why is there no longer a lake there? _____

9. A road winds up the valley that leads to Walker Lake. Why might people build a road to this lake? _____
