



Unsplash image

White Water Rafting – The Snowy River

A mapping activity for Year 11

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You have been asked by a client of your business “**Wet, Wild and Snowy**” to put together a white-water rafting trip down the Snowy River. Complete all of the tasks below to comply with the requirements of the client and your own knowledge of what will make your clients happy. Your knowledge of Biophysical Interactions and Map Skills will help you complete this task.

Resource: Kosciusko Map Extract, Kleeman and Peters *Skills in Australian Geography* p34–35

1. You will meet your clients at a town in AR 1966. What is its name? _____
2. Your starting point is an element of the built environment at 158643. _____
3. Your client gets car sick and wants to know how far you will be travelling in the car from the road intersection south of Mount Guthrie to the “drop in” starting point. _____ km
4. To provide the client with more information you decide to calculate the length of time it will take to drive this distance at an average speed of 25km/h. _____
5. One of your clients’ friends has decided to walk to the drop in point from the locked gate. You need to provide some information:
 - a. Grid Reference of the southernmost locked gate _____
 - b. Direction from the gate to the drop in point _____
 - c. Bearing from the gate to the drop in point _____
 - d. The local relief between these two points _____

Finally, we are at the drop in point! It is a cold morning, and you have to give a briefing in the sun.

6. State the aspect of slope at 156643. _____
7. Would you choose this site or 163644 to give your briefing?
Give a reason.

8. You need to state the direction you will be traveling when you enter the river.
State the general direction of flow for the Snowy River in AR 1564. _____

GEO SKILLS HSC: MAPPING ACTIVITY



Looking along the Main Range track towards Mt Northcote from near Mt Kosciusko. Photo: Peter Dowley. Source: Wikimedia Commons

9. You need to make the tributary of Blue Lake Creek in 3 hours.
How fast will you need to raft down the river? _____

You have arrived at the lunch spot before your hike to Blue Lake. Your client has some unfit friends on the trip, and he wants you to show them a cross section of the hike from the intersection of Blue Lake Creek and the Snowy River to 180700.

10. Draw two cross sections on another page. One cross-section will have a vertical scale of 1:4000 and the other will have a vertical scale of 1:2000.

11. Which of these two cross-sections would you show to the unfit friends to encourage them to walk up to blue lake? _____

12. Calculate the vertical exaggeration of each cross section.

1:4000 _____

1:2000 _____

13. What type of glacial landform feature is Blue Lake? _____

14. You need your clients to wear the appropriate clothing up to Blue Lake.

Using your knowledge of the adiabatic lapse rate, calculate the temperature at Blue Lake if the temperature at the bottom is 18°C. _____

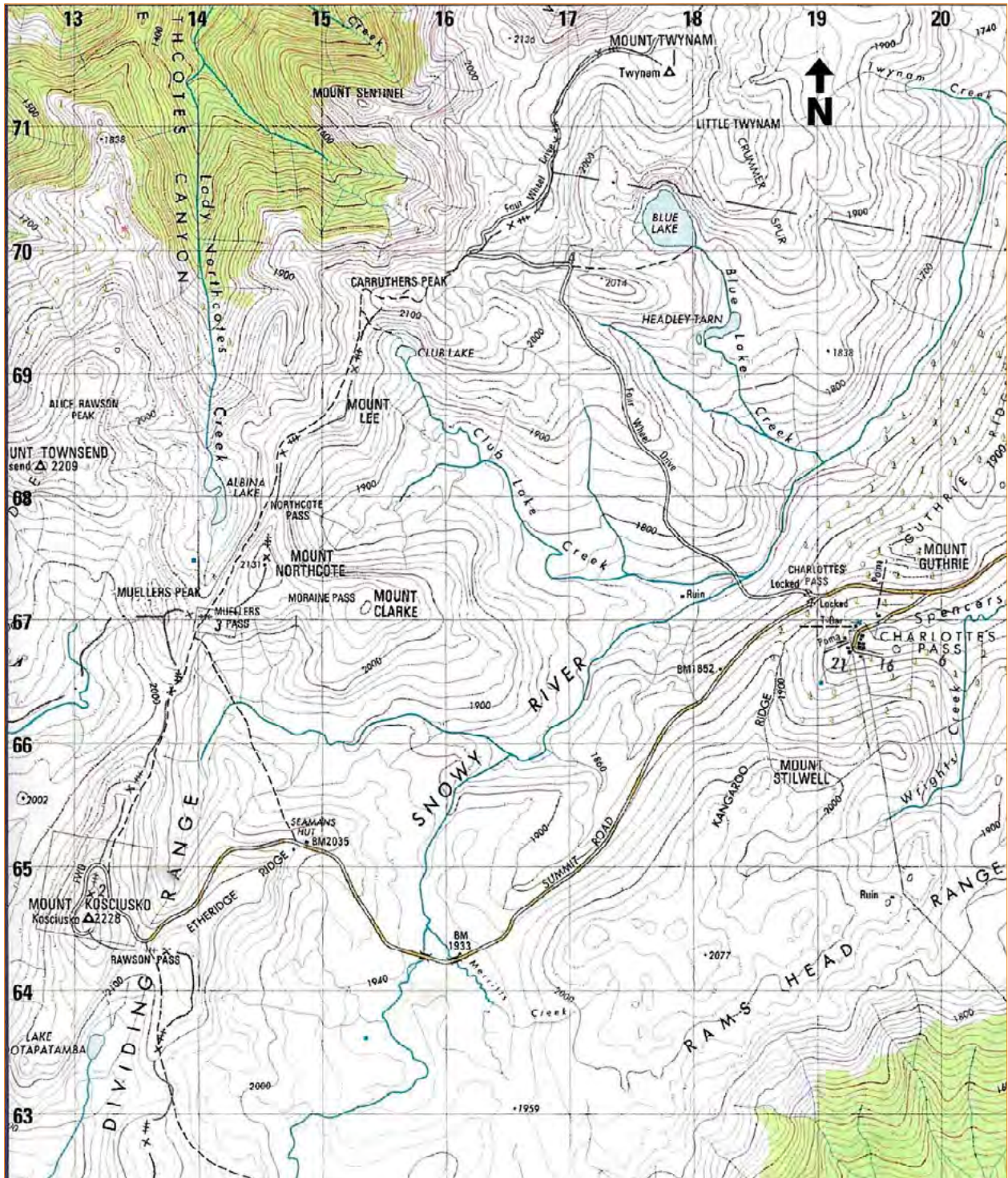
Safety is the number one priority. Rigorous laws govern outdoor adventure in Australia. For beginner rafters the gradient of the river must not be steeper than 1:15.

15. Can your trip proceed? Calculate the gradient of the Snowy River from the drop in point to Blue Lake Creek as a ratio. 1: _____

16. So can you go on your trip? _____

GEO SKILLS HSC: MAPPING ACTIVITY

Topographic Map Extract



Scale 1:50,000 Contour interval: 20 metres

To complete this activity, either use:

- The topographic map extract above
- *Skills in Geography Education*; Grant Kleeman, Andrew Peters. Pages 34–35
- A paper version of Thredbo Topographic Map or download a map from SixMaps e-topo

Note: If printing the map above select actual size to get the correct scale