

Beneath the surface

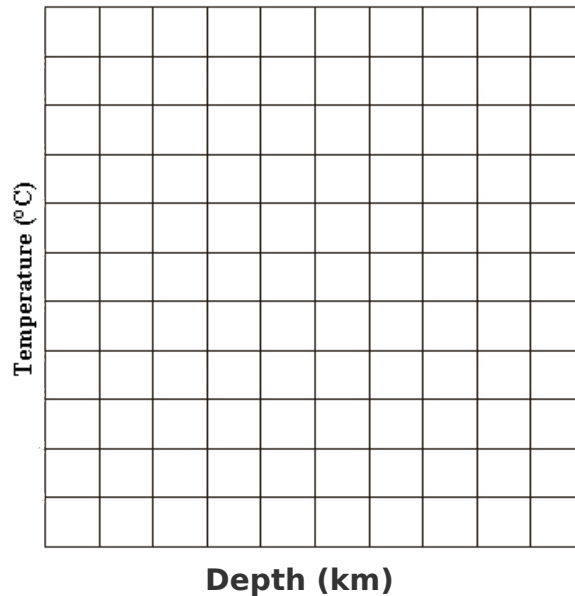
This task is about using data to explore temperature in the interior of the Earth.

The table below gives the temperatures recorded at different depths (as a change from the surface temperature) in a section of the Earth's crust.

Depth (km)	0	1	2	3	4	5	6	7	8
Temperature (°C)	0	20	45	70	95	120	?	170	195

a) Plot this data as a line graph.

Temperature change with depth in the Earth's crust



b) From the graph, what is the temperature at a depth of 6 km? _____ °C

c) An underground coal mine is being developed in this area. If the miners could work in temperatures of 30°C or less, what is the maximum depth this coal mine could be?

_____ km

d) Calculate the average temperature change for each kilometer change in depth. _____ °C

e) Write a sentence explaining how the relationship between temperature and depth changes as the depth increases.
