



Problem of the Week

Problem B and Solution

A Cool Trip

Problem

In 1911, the Norwegian explorer Roald Amundsen and his four companions were the first persons to travel to the South Pole. They spent 3 days at the Pole, plus 99 days travelling from their base camp to the Pole and back.

- The trip from the Pole back to the base camp took 39 days. How many days did the trip from the base camp **to** the Pole take?
- On the trip from the Pole back to the base camp, they averaged 30.4 km per day. How far was the base camp from the Pole?
- What was their average speed (in km per day) on the trip from the base camp **to** the Pole?



Source: Wikipedia

Solution

- The total travel time was 99 days, so the trip to the pole took $99 - 39 = 60$ days (much longer than the trip back).
- If they averaged 30.4 km per day for 39 days, they travelled a total distance of $39 \times 30.4 = 1185.6$ km.
- Since the distance to the pole was also 1185.6 km and they travelled for 60 days, their average speed was $1185.6 \div 60 = 19.76$ km per day.

