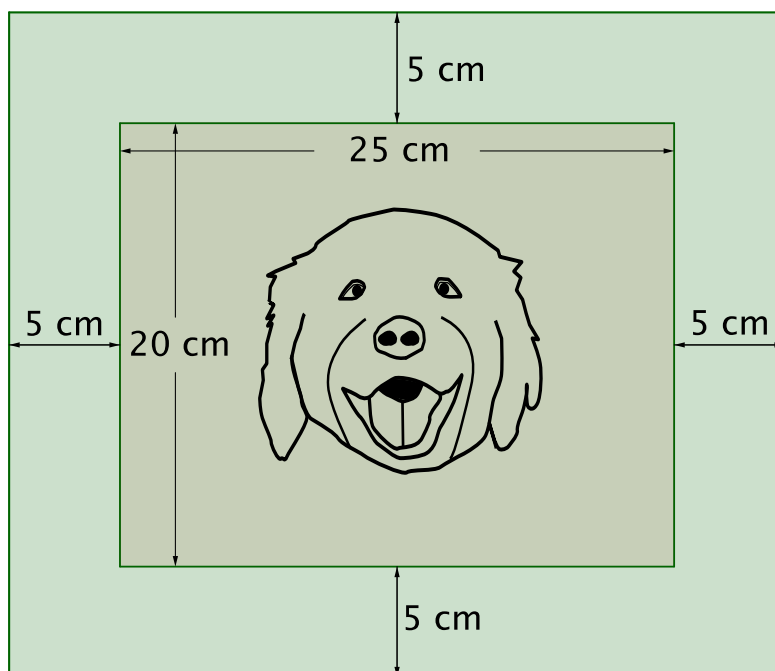


Problem of the Week

Problem B

Leo's Dog was Framed!

Leo built a picture frame using the plan illustrated below. The picture inside the frame is 25 cm wide and 20 cm high. The horizontal and vertical distance from the edge of the picture to the outer edge of the frame is 5 cm. This information is marked on the plan.



What is the area of the border of the frame? There are many ways to solve this problem. Try to solve the problem in more than one way.

Extension:

The area of the border of the frame is larger than the area of the picture inside the frame. The width of the current border is 5 cm. What would the width of the border need to be so that the area of the border equals the area of the picture? Determine your answer correctly rounded to one decimal place.

