



## Problem of the Week

### Problem B

### Right On Target!

Samina likes to practice darts using a board similar to the one shown. She shoots six darts and they all land on the board. Her score is the sum of the numbers on the rings in which her darts land. For the six darts shown on the target, her score would be  $1 + 3 + 3 + 5 + 5 + 9 = 26$ .

- Could Samina's score ever be 56? If yes, show how it can be done. If no, explain why the sum 56 cannot be obtained.
- Show how Samina could score 12? Show how she could score 8?
- Is there more than one possible way to score 28? If yes, list at least two different ways. If there is only one way to obtain 28, show it. If 28 cannot be obtained, explain why.
- Is it possible to get an odd score? If yes, show a possibility. If no, explain why an odd sum cannot be obtained.

