## Pool Deck

Background: Mr. C. D. Sacs is constructing a new deck and pool in his back yard. The plan is shown below. All dimensions are in feet. Area A is concrete deck. Area B is wooden deck. The circle indicates the pool. The last step of construction is putting a non-skid coating on all deck surfaces. The estimate from the contractor says non-skid coating all surfaces will cost $\$ 2,000$ dollars and that he is charging twice as much per square foot for the coating the wood as the concrete. You are Mr. Sac's assistant and he wants you to figure out how much it will cost just to coat the wood. How much would that be?


Task: Your job is to write a report for Mr. Sacs detailing your computations of how much would be saved by not coating the concrete.

## Procedure:

1. Read the background carefully.
2. Review the scoring rubric.
3. Determine the area of lot B. (Write out your work clearly for the report)
4. Divide lot A into geometric shapes whose areas can be determined, numbering each shape with a roman numeral. (Write out your work clearly for the report)
5. Use the given measurements determine the area of lot A. (Write out your work clearly for the report)
6. Use the areas of both lots, the $\$ 600$ figure, and the relationship of cost of coating the surface to figure out the cost of coating the concrete. (Write out your work clearly for the report)
7. Write a report detailing your steps, analysis, and findings.

## Dool Deck

Scoring Rubric
Names $\qquad$

|  | Possible Points | Points Awarded |
| :--- | :---: | :---: |
| Correctness of work and <br> calculation of area of lot B | 3 |  |
| Correctness of division and <br> labeling of lot A | 2 |  |
|  <br> calculations of area of lot A | 12 |  |
| Correctness of work and <br> calculations of fair price for <br> concrete | 3 |  |
| Report is complete and <br> concise | 5 |  |
|  | 25 |  |
| Total |  |  |

