1. **(2 points)**
   Simplify $2 \times (12 \times 18) \div 6 - 10$.

2. **(2 points)**
   If there are 20 honors students at Kahuku High School and 180 total students at the school, then the number of honors students at Kahuku High is what fraction of the total number of students? Express your fraction in simplest form.

3. **(2 points)**
   How many prime numbers are there in between 20 and 50?

4. **(2 points)**
   Kyle and Aditya do not have girlfriends. Their moms sign them up for blind dates. Kyle has a blind date every 3 days, while Aditya has a blind date every 5 days. If they start having dates on the same day, how many times will they have a blind date on the same day in the first 50 days?

5. **(3 points)**
   The sides of a triangle are in the ratio 7:6:2. If the length of the largest side is 28, what is the perimeter of the triangle?

6. **(3 points)**
   Charlie travels 50 miles from Sopchoppy to Tallahassee, and then immediately drives 40 miles from Tallahassee to Urbandale, all in 40 minutes. What is Charlie's average speed in miles per hour, from Sopchoppy to Urbandale?

7. **(3 points)**
   Rohith likes to shop a lot. During the first 19 times he went shopping, he spent an average of \$485.00. In order for the average cost during the first 20 times he went shopping to be \$500.00, how much must he spend in his 20th shopping trip?

8. **(3 points)**
   Express in simplest radical form $\sqrt{20} \times \sqrt{3}$?

9. **(4 points)**
   Let:

   $$A = \text{the Least Common Multiple of 24 and 52}$$
   $$B = \text{the Greatest Common Factor of 105 and 60}$$

   What is $A + B$?

10. **(4 points)**
    In a shipment of 10,000 flashlights, 5% are defective. What is the ratio of defective headlights to nondefective headlights?

11. **(4 points)**
    Nisha has a lot of bananas, so she decided to sell them. On the first day, she sold 198 pounds of bananas. On the 2nd day, she sold 24 more pounds than she did on the first day. On the 3rd day, she sold 12 pounds less than she sold on the 2nd day. On the 4th day, she sold 29 pounds more than what she sold on the 3rd day. How many pounds of bananas did she sell during those 4 days?

12. **(4 points)**
    Let:

    $$A = 14.8 - 6.1 - 4.3 + 1.8$$
    $$B = 6.5 + 5.0 - 2.8$$
    $$C = 8.1 + 6.7 + 8.9$$
    $$D = 7.5 - 14.3 + 18.6$$

    Calculate $A + B - C - D$ as a decimal.

13. **(5 points)**
    Maia really likes the card game Coup. She likes it so much that she decided to buy it for each student in her History class to play. The card game sells for $12. There are 25 students in Maia's history class. Fortunately, she got a 15% discount. If there is a 6% sales tax after the discount, what is the final price, in dollars, of the 25 games of Coup?

14. **(5 points)**
    Let:

$$
\begin{aligned}
A &= \text{the mean of the set } 6,\ 4,\ 9,\ 7,\ 1,\ 8,\ 2,\ 9,\ 9,\ 4,\ 9,\ 3,\ 7 \\
B &= \text{the mode of the set } 9,\ 6,\ 5,\ 9,\ 3,\ 9,\ 4,\ 2,\ 8,\ 9,\ 1,\ 9,\ 7 \\
C &= \text{the average of the set } 3,\ 7,\ 3,\ 6,\ 7,\ 8,\ 2,\ 6,\ 2,\ 8,\ 3,\ 6,\ 4 \\
D &= \text{the median of the set } 3,\ 9,\ 5,\ 8,\ 1,\ 5,\ 9,\ 2,\ 5,\ 1,\ 7,\ 1,\ 8
\end{aligned}
$$

    Evaluate $BC - AD$.

15. **(5 points)**
    Yousef needs $2.37 in postage to mail a letter. If he has 60-cent, 37-cent, 23-cent, 5-cent, and 1-cent stamps. What is the smallest number of stamps he can use that will get him the exact postage he needs?