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## THE MATH CHALLENGE

## INTRODUCTION: FARMERS USE A SIGNIFICANT AMOUNT OF MATH IN THEIR DAILY OPERATIONS. SOLVE THE PROBLEMS BELOW. SHOW YOUR WORK AND INCLUDE UNITS IN YOUR ANSWERS.

1. A farmer is planting a 47-acre field of green beans. How many seeds must be purchased if the farmer plants 140,000 seeds per acre?

2. Green bean seeds are sold in pounds. There are approximately 2,000 seeds per pound, depending on seed size. How many pounds should the farmer purchase?
3. The price of green bean seed is $\$ 37.50$ for a five-pound bag. How much will it cost to plant the entire field?
4. An acre is an area of land equivalent to 43,560 square feet. What is the area, in square feet, of the farmer's field?
5. There are 351 rows in the field. Each row is 1,400 feet long. The planter can plant three rows at the same time. How many miles will the tractor drive to plant the entire field? Hint: There are 5,280 feet in one mile.
6. If a tractor travels at 6 MPH , how long will it take to plant the entire field?
