

Achilles is arrogant and boasted widely that he could beat the village tortoise in a race. In fact, he was so confident in his abilities that he gave the tortoise a mile head start (5280 feet). Fortunately for Achilles, the tortoise could only manage to move 12.3 feet per minute, while he could run a mile in 8 minutes. How long did it take Achilles to catch up? How far does the race need to be for Achilles to win?

1. Write Achilles speed as a fraction.
2. Convert Achilles speed to feet per minute.
3. Complete the table for the labelled times below.
4. Add more times to the table to find when Achilles catches up to the tortoise.

Distance from the where Achilles started

Time	Achilles	Tortoise
Start (0 minutes)		
1 minute		
2 minutes		
5 minutes		
10 minutes		

5. How long did it take Achilles to catch up?
6. How far does the race need to be for Achilles to win?