Name $\qquad$

## Graphing Time and Distance and Calculating Speed

Directions: Using a piece of graph paper, graph the motion of the two bicyclists, Juanita and Henry. Place time on the horizontal axis of your graph and distance on the vertical axis Plot Juanita's course of motion in $\qquad$ then plot Henry's course of motion on the same graph in $\qquad$ . Once you are finished, answer the question on the back.

|  | Juanita | Henry |
| :--- | :--- | :--- |
| Time in seconds | Distance in meters | Distance in meters |
| 20 sec. | 15 m | 14 m |
| 40 sec. | 32 m | 29 m |
| 60 sec. | 48 m | 44 m |
| 80 sec. | 67 m | 62 m |
| 100 sec. | 88 m | 83 m |
| 120 sec. | 94 m | 98 m |
| 140 sec. | 102 m | 108 m |
| 160 sec. | 180 m | 138 m |


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Speed = distance/time

1. Calculate Juanita's speed between 100 and 140 seconds. Show your work.
2. Calculate Henry's speed between 100 and 140 seconds. Show your work.
3. Who has the greater speed between 100 and 140 seconds. What may have caused this?
4. Calculate Juanita's speed between 140 and 160 seconds. Show your work.
5. Calculate Henry's speed between 140 and 160 seconds. Show your work.
6. Who has the greater speed between 140 and 160 seconds. What may have caused this?
7. At what distance did Henry pass Juanita?
8. Which person rode the farthest in 160 seconds?
