## Projectile-Horizontal Distance ${ }^{54}$

The pictures below depict cannonballs of two different masses projected upward and forward. The cannonballs are projected at various angles above the horizontal, but all are projected with the same horizontal component of velocity.

Rank according to the horizontal distance traveled by the balls.
A
B
C

D



Largest 1 $\qquad$ 2 $\qquad$
$\qquad$ 4 $\qquad$ 5 $\qquad$ 6 $\qquad$ Smallest

All distances traveled are the same. $\qquad$
Please carefully explain your reasoning.

How sure were you of your ranking? (circle one)
Basically Guessed
$4 \quad 5$
6
7
Very Sure
9
10

[^0]
[^0]:    ${ }^{54}$ S. Heath

