10 Two railway trucks of masses m and $3m$ move towards each other in opposite directions with speeds $2v$ and v respectively. These trucks collide and stick together.

What is the speed of the trucks after the collision?

A $\frac{v}{4}$ 　　　　　　 **B** $\frac{v}{2}$ 　　　　　　 **C** v 　　　　　　 **D** $\frac{5v}{4}$