

- 11 An isolated system consists of two bodies on which no external forces act. The two bodies collide with each other and stick together on impact.

Which row correctly compares the total kinetic energy and the total momentum of the bodies before and after the collision?

| | total kinetic energy before and after the collision | total momentum before and after the collision |
|----------|--|--|
| A | different | different |
| B | different | the same |
| C | the same | different |
| D | the same | the same |

- 12 A mass accelerates uniformly when the resultant force acting on it