



The National Orthodox School/ Shmaisani

Name: KEY

Subject: science  
Worksheet (4): Net Forces

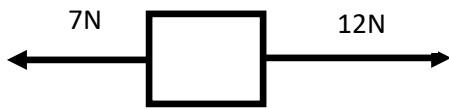
Date: / /

Class: Grade: 6

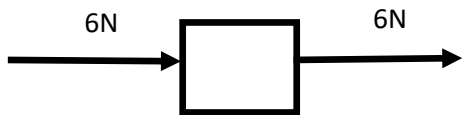
**Objective:**

- Calculate the net force acting on an object.
- Understand the difference between balanced and unbalanced forces.

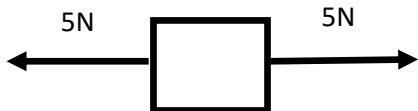
Find the net force in each of the following situations, and decide if the forces are balanced or unbalanced.



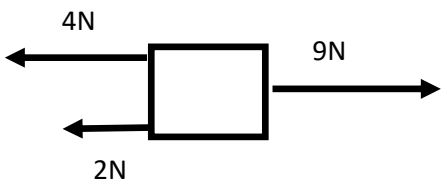
Net force:  $12\text{N} - 7\text{N} = 5\text{N}$   
(Unbalanced forces)



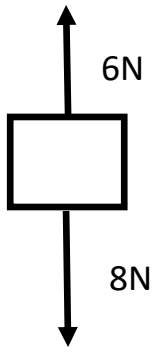
Net force:  $6\text{N} + 6\text{N} = 12\text{N}$   
(Unbalanced forces)



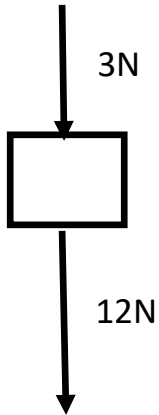
Net force:  $5\text{N} - 5\text{N} = 0\text{N}$  (Balanced forces)



Net force:  $4\text{N} + 2\text{N} = 6\text{N}$        $9\text{N} - 6\text{N} = 3\text{N}$   
(Unbalanced forces)

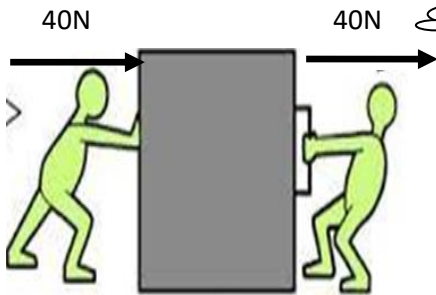


Net force:  $8\text{ N} - 6\text{ N} = 2\text{ N}$  ↓  
 (Unbalanced forces)

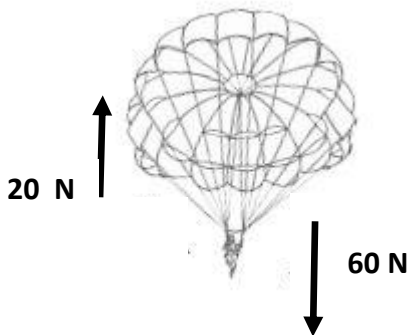


Net force:  $12\text{ N} + 3\text{ N} = 15\text{ N}$  ↓  
 (Unbalanced forces)

Please correct the direction of the arrow on the printed worksheet.



Net force:  $40\text{ N} + 40\text{ N} = 80\text{ N}$  →  
 (Unbalanced forces)



Net force:  $60\text{ N} - 20\text{ N} = 40\text{ N}$  ↓  
 (Unbalanced forces)