

# KQS COACHING CENTER

| Date: \_\_\_\_\_ | | Class: XI | | Paper: Physics | | Time: 30 minutes | | Max. Marks: 25 | | Test # 2 |

| NAME: \_\_\_\_\_ | | F.NAME: \_\_\_\_\_ |

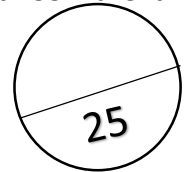
Q1: Define unit and position vector.

Q2: If  $\vec{A} = 2\hat{i} + 3\hat{j} - 4\hat{k}$ ,  $\vec{B} = 3\hat{i} - 4\hat{j} + 2\hat{k}$  and  $\vec{C} = -4\hat{i} + 2\hat{j} + 2\hat{k}$  then find  $|4\vec{A} - 2\vec{B} + 4\vec{C}|$ .

Q3: Two tugboats are towing a ship, each exert a force of 6000N and the angle between the two ropes is  $60^\circ$  calculate the resultant force on the ship.

Q4: The position vectors of point P and Q are  $\vec{r}_1 = 2\hat{i} + 3\hat{j} - \hat{k}$   $\vec{r}_2 = 4\hat{i} - 3\hat{j} + 2\hat{k}$  find  $\vec{PQ}$ .

Q5: If one of the rectangular components of force 50N is 25N, find the value of other.



Prepared by: Sir Hasnain

Contact #: 03312189275

Email address: Hasnainkhankqs@gmail.com

# KQS COACHING CENTER

| Date: \_\_\_\_\_ | | Class: XI | | Paper: Physics | | Time: 30 minutes | | Max. Marks: 25 | | Test # 2 |

| NAME: \_\_\_\_\_ | | F.NAME: \_\_\_\_\_ |

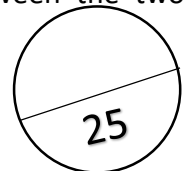
Q1: Define unit and position vector.

Q2: If  $\vec{A} = 2\hat{i} + 3\hat{j} - 4\hat{k}$ ,  $\vec{B} = 3\hat{i} - 4\hat{j} + 2\hat{k}$  and  $\vec{C} = -4\hat{i} + 2\hat{j} + 2\hat{k}$  then find  $|4\vec{A} - 2\vec{B} + 4\vec{C}|$ .

Q3: Two tugboats are towing a ship, each exert a force of 6000N and the angle between the two ropes is  $60^\circ$  calculate the resultant force on the ship.

Q4: The position vectors of point P and Q are  $\vec{r}_1 = 2\hat{i} + 3\hat{j} - \hat{k}$   $\vec{r}_2 = 4\hat{i} - 3\hat{j} + 2\hat{k}$  find  $\vec{PQ}$ .

Q5: If one of the rectangular components of force 50N is 25N, find the value of other.



Prepared by: Sir Hasnain

Contact #: 03312189275

Email address: Hasnainkhankqs@gmail.com

# KQS COACHING CENTER

| Date: \_\_\_\_\_ | | Class: XI | | Paper: Physics | | Time: 30 minutes | | Max. Marks: 25 | | Test # 2 |

| NAME: \_\_\_\_\_ | | F.NAME: \_\_\_\_\_ |

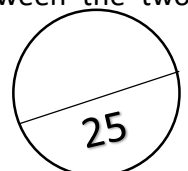
Q1: Define unit and position vector.

Q2: If  $\vec{A} = 2\hat{i} + 3\hat{j} - 4\hat{k}$ ,  $\vec{B} = 3\hat{i} - 4\hat{j} + 2\hat{k}$  and  $\vec{C} = -4\hat{i} + 2\hat{j} + 2\hat{k}$  then find  $|4\vec{A} - 2\vec{B} + 4\vec{C}|$ .

Q3: Two tugboats are towing a ship, each exert a force of 6000N and the angle between the two ropes is  $60^\circ$  calculate the resultant force on the ship.

Q4: The position vectors of point P and Q are  $\vec{r}_1 = 2\hat{i} + 3\hat{j} - \hat{k}$   $\vec{r}_2 = 4\hat{i} - 3\hat{j} + 2\hat{k}$  find  $\vec{PQ}$ .

Q5: If one of the rectangular components of force 50N is 25N, find the value of other.



Prepared by: Sir Hasnain

Contact #: 03312189275

Email address: Hasnainkhankqs@gmail.com