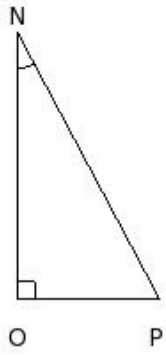
EduSahara™ Assignment

Name : Basics of Trigonometric Ratios

Chapter : Introduction to Trigonometry

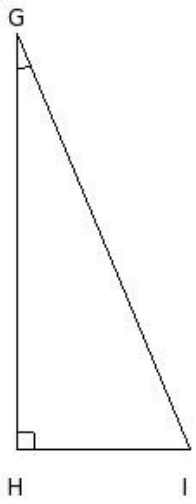
Grade : CBSE Grade X

1. In the given figure, $\sin N$ =



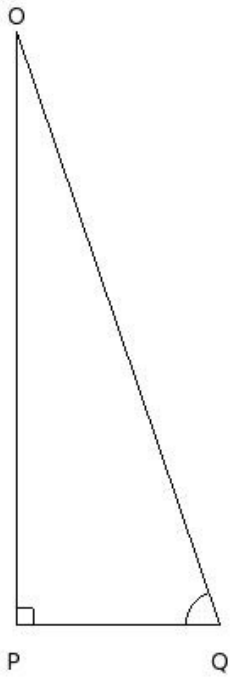
(i) $\frac{PO}{NO}$ (ii) $\frac{OP}{NP}$ (iii) $\frac{QP}{QO}$ (iv) $\frac{OP}{ON}$ (v) $\frac{NO}{PO}$

2. In the given figure, $\cos G$ =



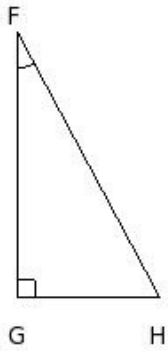
(i) $\frac{GH}{GI}$ (ii) $\frac{IH}{JH}$ (iii) $\frac{GI}{GH}$ (iv) $\frac{IG}{IH}$ (v) $\frac{IG}{HG}$

3. In the given figure, $\tan Q =$



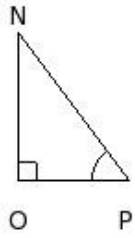
(i) $\frac{OP}{PQ}$ (ii) $\frac{QP}{OQ}$ (iii) $\frac{QP}{RQ}$ (iv) $\frac{QO}{PQ}$ (v) $\frac{OP}{QO}$

4. In the given figure, $\cot F =$



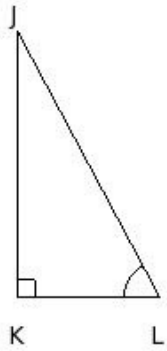
(i) $\frac{HF}{FG}$ (ii) $\frac{HG}{IH}$ (iii) $\frac{HF}{GH}$ (iv) $\frac{FG}{GH}$ (v) $\frac{FH}{HG}$

5. In the given figure, $\sec P =$



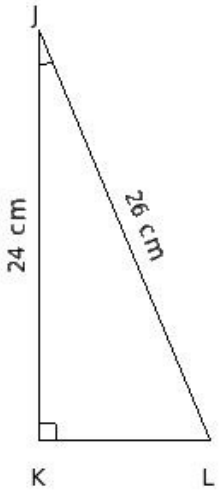
(i) $\frac{PO}{PN}$ (ii) $\frac{ON}{OP}$ (iii) $\frac{NO}{NP}$ (iv) $\frac{NP}{OP}$ (v) $\frac{QO}{QP}$

6. In the given figure, $\operatorname{cosec} L =$



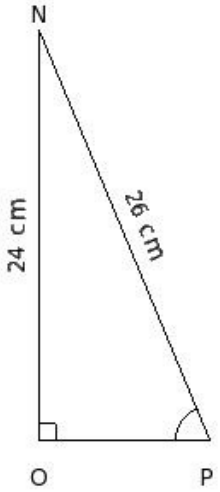
(i) $\frac{LK}{JK}$ (ii) $\frac{KJ}{LJ}$ (iii) $\frac{MK}{LK}$ (iv) $\frac{JK}{LK}$ (v) $\frac{JL}{JK}$

7. In the given figure, $\sin J =$



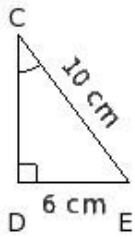
(i) $\frac{7}{13}$ (ii) $\frac{5}{11}$ (iii) $\frac{5}{13}$ (iv) $\frac{1}{3}$ (v) $\frac{3}{13}$

8. In the given figure, $\cos P =$



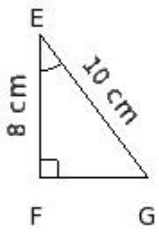
(i) $\frac{1}{3}$ (ii) $\frac{7}{13}$ (iii) $\frac{5}{11}$ (iv) $\frac{5}{13}$ (v) $\frac{3}{13}$

9. In the given figure, $\tan C$ =



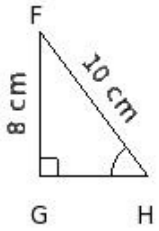
(i) $\frac{3}{2}$ (ii) $\frac{5}{4}$ (iii) $\frac{3}{4}$ (iv) $\frac{1}{4}$ (v) $\frac{1}{2}$

10. In the given figure, $\cot E$ =



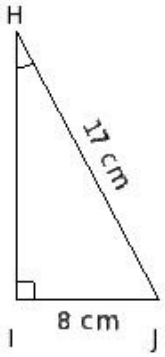
(i) 2 (ii) $\frac{4}{5}$ (iii) $\frac{2}{3}$ (iv) $\frac{4}{3}$ (v) 4

11. In the given figure, $\sec H$ =



(i) $\frac{5}{3}$ (ii) 5 (iii) 1 (iv) $\frac{7}{3}$

12. In the given figure, $\operatorname{cosec} H$ =



(i) $\frac{19}{8}$ (ii) $\frac{17}{8}$ (iii) $\frac{15}{8}$ (iv) $\frac{17}{10}$ (v) $\frac{17}{6}$

13. $\sin K$ =

(i) $\frac{1}{\cot K}$ (ii) $\frac{1}{\tan K}$ (iii) $\frac{1}{\sec K}$ (iv) $\frac{1}{\operatorname{cosec} K}$ (v) $\frac{1}{\cos K}$

14. $\cos A =$

(i) $\frac{1}{\sec A}$ (ii) $\frac{1}{\operatorname{cosec} A}$ (iii) $\frac{1}{\cot A}$ (iv) $\frac{1}{\sin A}$ (v) $\frac{1}{\tan A}$

15. $\tan L =$

(i) $\frac{1}{\cos L}$ (ii) $\frac{1}{\sec L}$ (iii) $\frac{1}{\cot L}$ (iv) $\frac{1}{\operatorname{cosec} L}$ (v) $\frac{1}{\sin L}$

16. $\cot M =$

(i) $\frac{1}{\sin M}$ (ii) $\frac{1}{\sec M}$ (iii) $\frac{1}{\cos M}$ (iv) $\frac{1}{\operatorname{cosec} M}$ (v) $\frac{1}{\tan M}$

17. $\sec C =$

(i) $\frac{1}{\operatorname{cosec} C}$ (ii) $\frac{1}{\cot C}$ (iii) $\frac{1}{\tan C}$ (iv) $\frac{1}{\cos C}$ (v) $\frac{1}{\sin C}$

18. $\operatorname{cosec} F =$

(i) $\frac{1}{\cot F}$ (ii) $\frac{1}{\tan F}$ (iii) $\frac{1}{\sec F}$ (iv) $\frac{1}{\sin F}$ (v) $\frac{1}{\cos F}$

19. In $\triangle FGH$, right angled at G, if $FG = 35$ cm and $GH = 12$ cm, find $\sin H$

(i) 1 (ii) $\frac{35}{37}$ (iii) $\frac{35}{39}$ (iv) $\frac{33}{37}$

20. In $\triangle FGH$, right angled at G, if $FG = 35$ cm and $GH = 12$ cm, find $\cos H$

(i) $\frac{10}{37}$ (ii) $\frac{14}{37}$ (iii) $\frac{4}{13}$ (iv) $\frac{12}{35}$ (v) $\frac{12}{37}$

21. In $\triangle OPQ$, right angled at P, if $OP = 8$ cm and $PQ = 6$ cm, find $\tan Q$

(i) $\frac{4}{3}$ (ii) $\frac{4}{5}$ (iii) $\frac{2}{3}$ (iv) 4 (v) 2

22. In $\triangle NOP$, right angled at O, if $NO = 8$ cm and $OP = 6$ cm, find $\cot N$

(i) $\frac{4}{5}$ (ii) $\frac{2}{3}$ (iii) 4 (iv) 2 (v) $\frac{4}{3}$

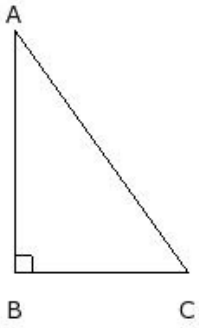
23. In $\triangle FGH$, right angled at G, if $FG = 15$ cm and $GH = 8$ cm, find $\sec H$

(i) $\frac{17}{6}$ (ii) $\frac{19}{8}$ (iii) $\frac{15}{8}$ (iv) $\frac{17}{10}$ (v) $\frac{17}{8}$

24. In $\triangle HIJ$, right angled at I, if HI = 24 cm and IJ = 10 cm, find cosec H

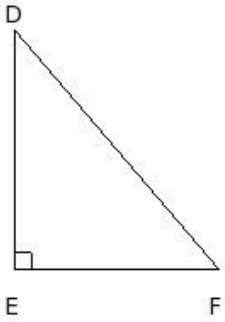
(i) $\frac{13}{3}$ (ii) $\frac{13}{7}$ (iii) 3 (iv) $\frac{13}{5}$ (v) $\frac{11}{5}$

25. From the given figure, find $\sin(90 - C)$



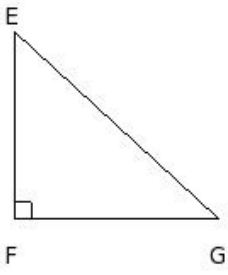
(i) $\frac{AB}{BC}$ (ii) $\frac{BC}{AC}$ (iii) $\frac{AC}{AB}$ (iv) $\frac{BC}{AB}$ (v) $\frac{AB}{AC}$

26. From the given figure, find $\cos(90 - D)$



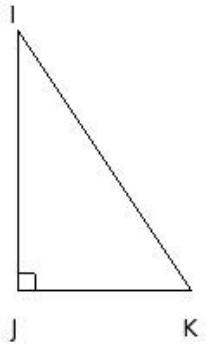
(i) $\frac{DF}{DE}$ (ii) $\frac{DE}{DF}$ (iii) $\frac{DE}{EF}$ (iv) $\frac{EF}{DF}$ (v) $\frac{EF}{DE}$

27. From the given figure, find $\tan(90 - E)$



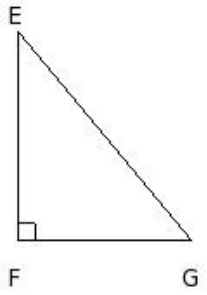
(i) $\frac{FG}{EG}$ (ii) $\frac{EF}{EG}$ (iii) $\frac{EG}{FG}$ (iv) $\frac{EF}{FG}$ (v) $\frac{EG}{EF}$

28. From the given figure, find $\operatorname{cosec}(90 - K)$



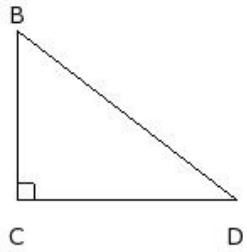
(i) $\frac{IJ}{IK}$ (ii) $\frac{IK}{JK}$ (iii) $\frac{JK}{IJ}$ (iv) $\frac{IJ}{JK}$ (v) $\frac{IK}{IJ}$

29. From the given figure, find $\sec(90 - G)$



(i) $\frac{FG}{EF}$ (ii) $\frac{EG}{FG}$ (iii) $\frac{FG}{EG}$ (iv) $\frac{EF}{FG}$ (v) $\frac{EG}{EF}$

30. From the given figure, find $\cot(90 - D)$



(i) $\frac{BC}{BD}$ (ii) $\frac{BD}{BC}$ (iii) $\frac{BC}{CD}$ (iv) $\frac{BD}{CD}$ (v) $\frac{CD}{BD}$

Assignment Key

1) (ii)	2) (i)	3) (i)	4) (iv)	5) (iv)	6) (v)
7) (iii)	8) (iv)	9) (iii)	10) (iv)	11) (i)	12) (ii)
13) (iv)	14) (i)	15) (iii)	16) (v)	17) (iv)	18) (iv)
19) (ii)	20) (v)	21) (i)	22) (v)	23) (v)	24) (iv)
25) (ii)	26) (iv)	27) (iv)	28) (ii)	29) (v)	30) (iii)