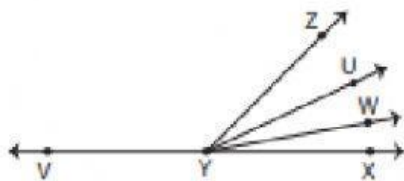


Concept HW_Grade-7_Lines and Angles

Advanced Problems on Basics of Lines and Angles

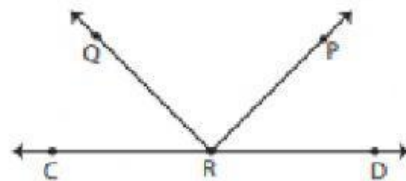
Find the value of x .

1)



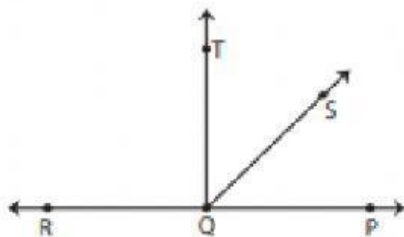
$$\begin{aligned} m\angle UYZ &= 20^\circ & m\angle WYU &= 15^\circ \\ m\angle XYW &= 10^\circ & m\angle VYZ &= (x+2)^\circ \\ x &= \boxed{} \end{aligned}$$

2)



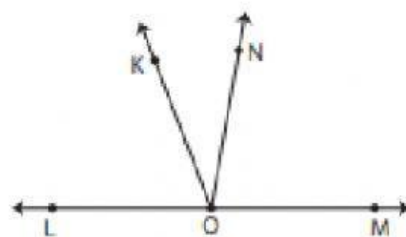
$$\begin{aligned} m\angle QRP &= 90^\circ & m\angle CRQ &= 45^\circ \\ m\angle PRD &= (2x-1)^\circ \\ x &= \boxed{} \end{aligned}$$

3)



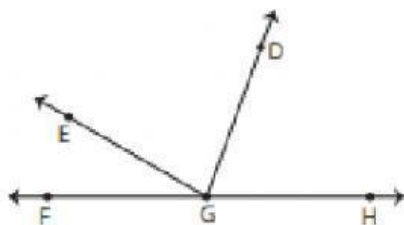
$$\begin{aligned} m\angle PQS &= (x-56)^\circ & m\angle RQT &= 90^\circ \\ m\angle SQT &= 46^\circ \\ x &= \boxed{} \end{aligned}$$

4)



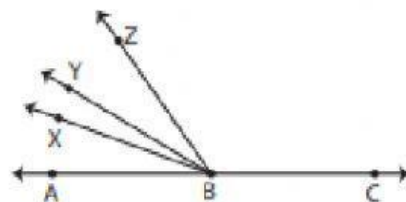
$$\begin{aligned} m\angle MON &= 80^\circ & m\angle LOK &= 69^\circ \\ m\angle KON &= (6x+1)^\circ \\ x &= \boxed{} \end{aligned}$$

5)



$$\begin{aligned} m\angle DGE &= 80^\circ & m\angle EGF &= 2x^\circ \\ m\angle HGD &= 70^\circ \\ x &= \boxed{} \end{aligned}$$

6)



$$\begin{aligned} m\angle CBZ &= (x-4)^\circ & m\angle ZBY &= 24^\circ \\ m\angle XBY &= 11^\circ & m\angle ABX &= 20^\circ \\ x &= \boxed{} \end{aligned}$$