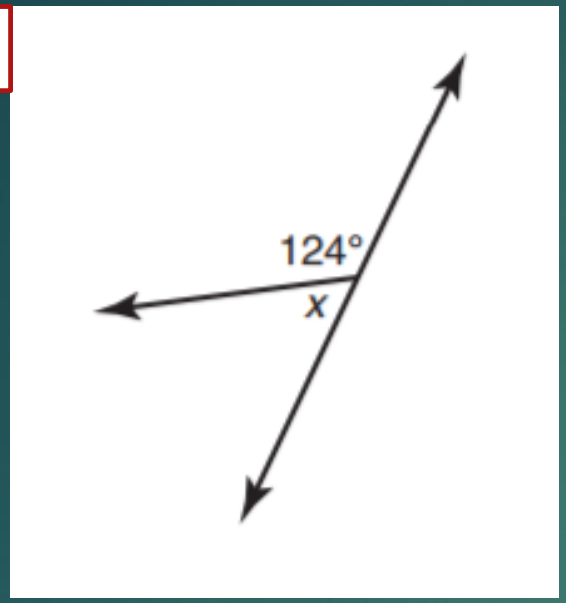
1)



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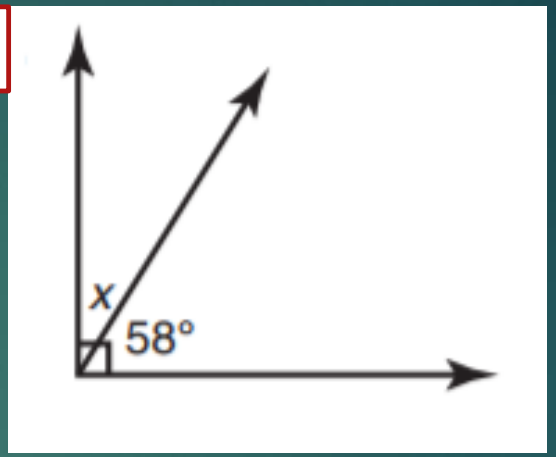

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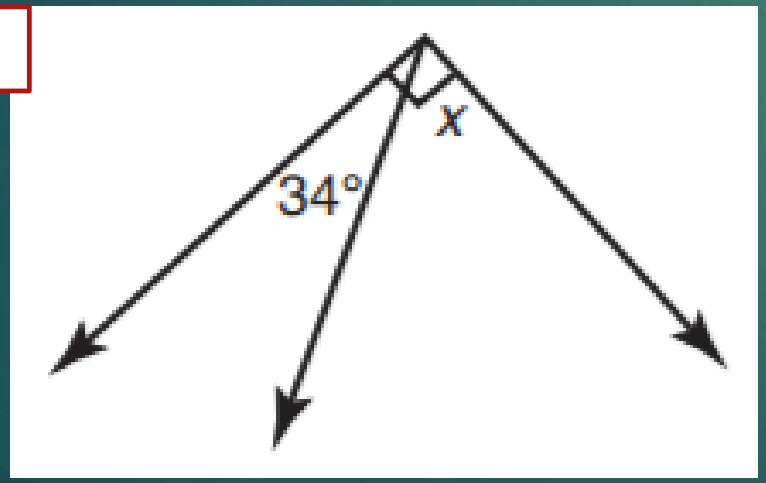

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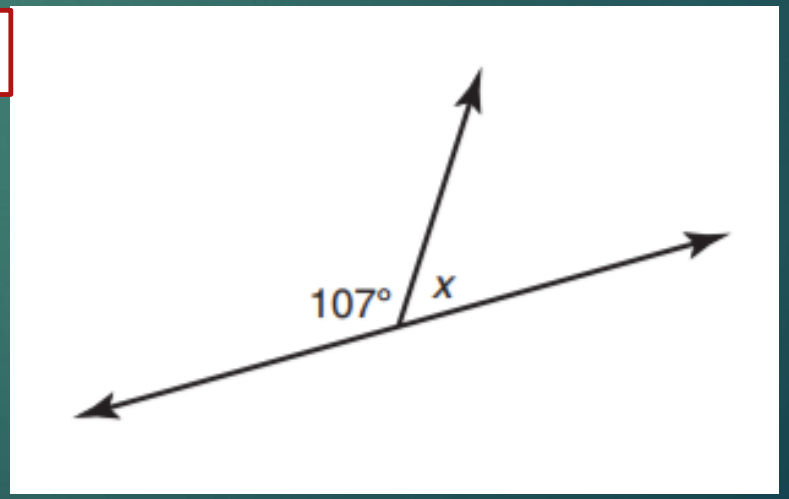


Use the given information to determine the measures of the angles in each pair.

Example:

The measure of the complement of an angle is three times the measure of the angle. What is the measure of each angle?

$x + 3x = 90$

$4x = 90$

$x = 22.5$

The measure of the angle is 22.5° and the measure of the complement is 67.5°.

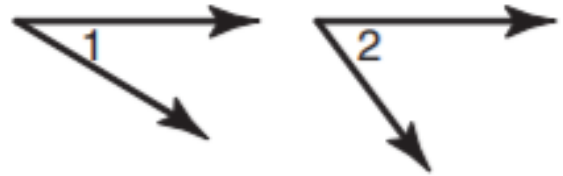
5) The measure of the supplement of an angle is one fourth the measure of the angle. What is the measure of each angle?

6) The measure of the supplement of an angle is twice the measure of the angle. What is the measure of each angle?

For each diagram, determine whether angles 1 and 2 are adjacent angles.

7)

8)



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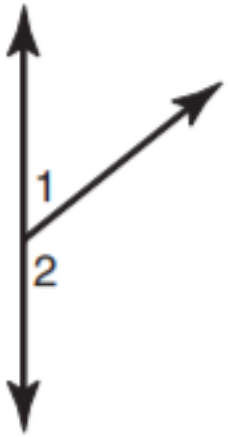

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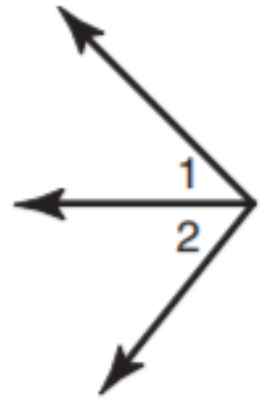
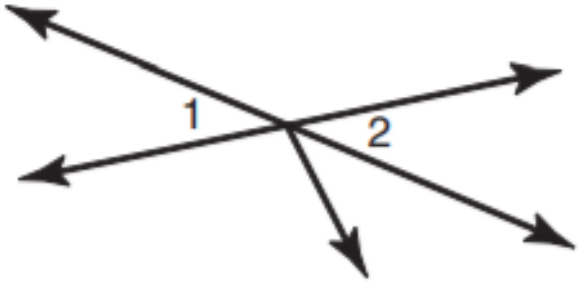


For each diagram, determine whether angles 1 and 2 form a linear pair.

11)



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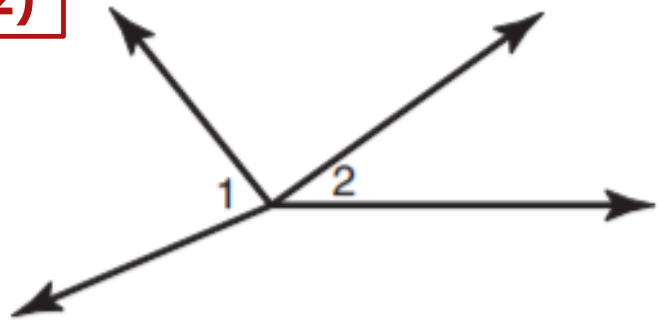

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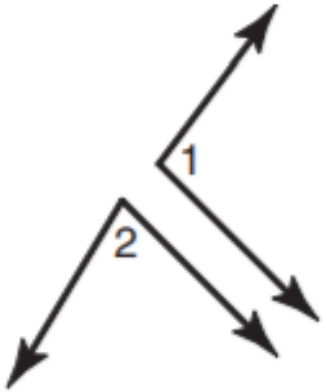

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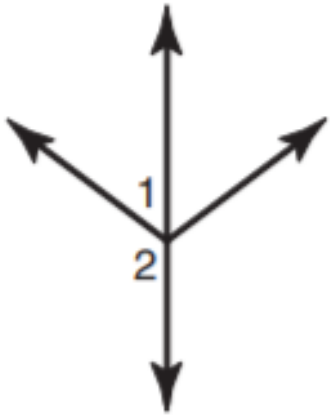
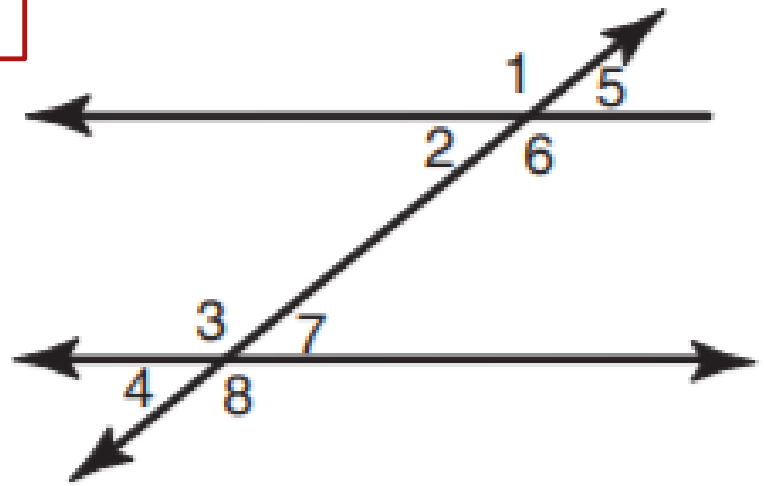


Name each pair of vertical angles.

15)



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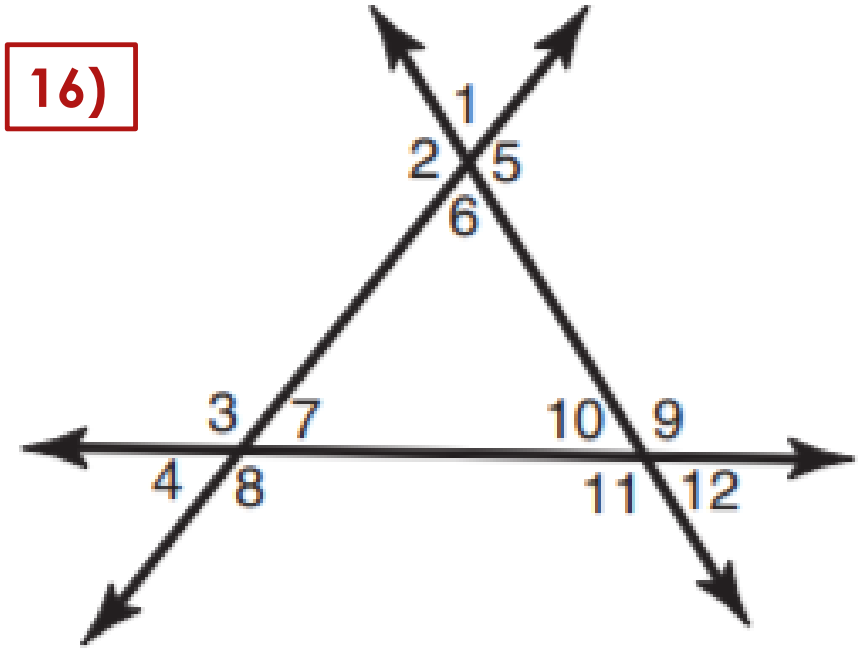
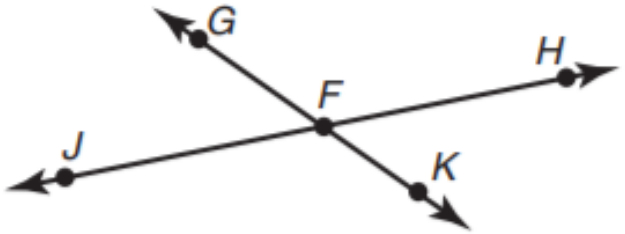


Write the postulate that confirms each statement.

Example:

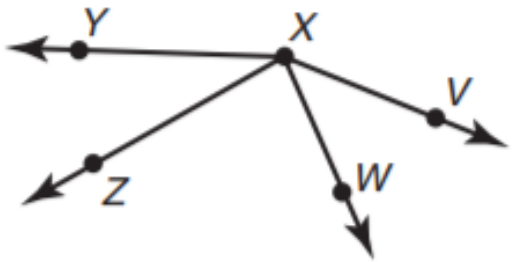
Angles *GFH* and *KFH* are supplementary angles.



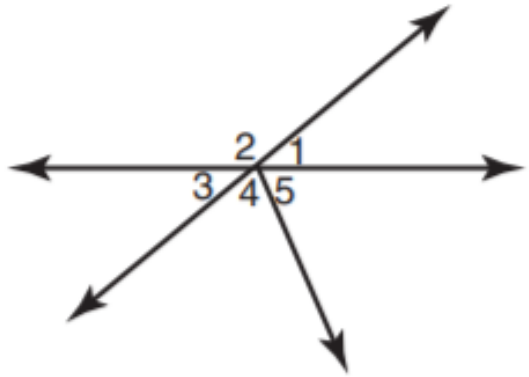
Linear Pair Postulate

17) $m\overline{RS} + m\overline{ST} = m\overline{RT}$

18) $m\angle WXZ + m\angle ZXY = m\angle WXY$

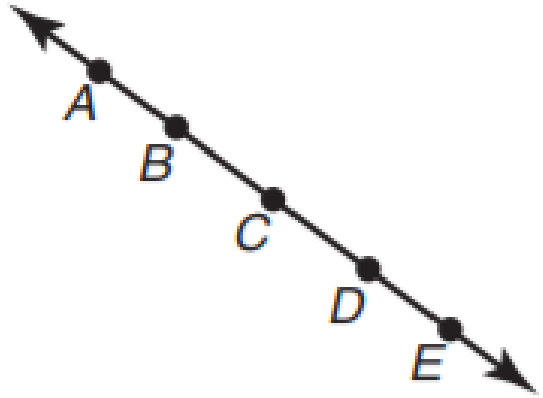


19) $m\angle 1 + m\angle 2 = 180°$



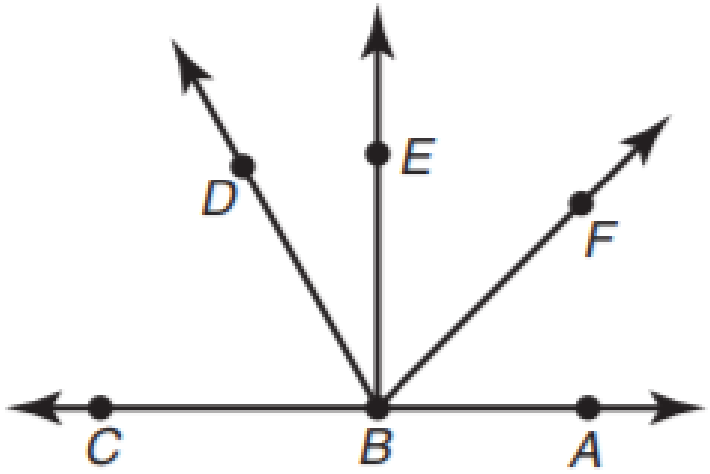
20)

$BC + CD = BD$



21)

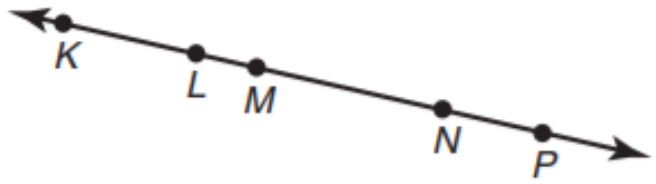
$m\angle DBE + m\angle EBF = m\angle DBF$



Complete each statement. The write the postulate you used.

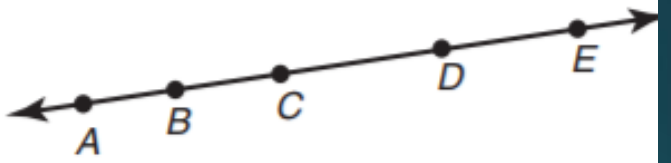
Example:

$m\overline{LM} + m\overline{MN} = m\overline{LN}$

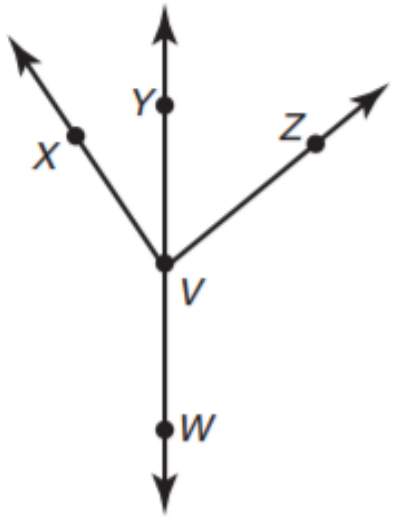


Segment Addition Postulate

22) $m\overline{AB} + m$ $= m\overline{AC}$



23) $m\angle YVZ + m\angle$ $= 180°$



24) $m\angle$ $+ m\angle$ $= m\angle MJK$