Direct and Inverse Variation | Equation

Answer Key

State whether each equation represents a direct or an inverse variation. Find the constant of variation (k).

1)
$$-10 + 15xy = 20$$

2)
$$17y - 4x = 0$$

Inverse variation, k = 2

Direct variation,
$$k = \frac{4}{17}$$

3)
$$-18x + y = 0$$

4)
$$-13xy + 3 = -8$$

Direct variation, k = 18

Inverse variation, $k = \frac{11}{13}$

5)
$$\frac{x}{3y} = 17$$

6)
$$2yx - 6 = 14$$

Direct variation, $k = \frac{1}{51}$

Inverse variation, k = 10

7)
$$15 + 2yx = 21$$

8)
$$-4x + 9y = 0$$

Inverse variation, k = 3

Direct variation,
$$k = \frac{4}{9}$$

9)
$$7xy = 14$$

10)
$$-y + 9x = 0$$

Inverse variation, k = 2

Direct variation, k = 9