Rearranging Equations of Straight Lines

Rearrange these equations into the form $y = mx + c$

(a) $y = 5 + 3x$ (b) $3y = 12 - 9x$

(c) $2y = 6x + 10$ (d) $2x + y = 15$

(e) $y - 4x = 9$ (f) $4x + 2y = 12$

(g) $x + y - 5 = 0$ (h) $2x + 3y - 7 = 0$

(a) $y = 3x + 5$

(b) $y = -3x + 4$

(c) $y = 3x + 5$

(d) $y = -2x + 15$

(e) $y = 4x + 9$

(f) $y = -2x + 6$

(g) $y = -x + 5$

(h) $y = -\frac{2}{3}x + \frac{7}{3}$

Rearrange these equations into the form $ax + by + c = 0$

(a) $y = x - 5$ (b) $y = 2x + 5$

(c) $y = -4x + 7$ (d) $y = -x - 3$

(e) $y = \frac{1}{2}x + 4$ (f) $y = \frac{1}{3}x - \frac{5}{3}$

(a) $x - y - 5 = 0$

(b) $2x - y + 5 = 0$

(c) $4x + y - 7 = 0$

(d) $x + y + 3 = 0$

(e) $x - 2y + 8 = 0$

(f) $x - 3y - 5 = 0$

Rearrange these equations into the form $ax + by = c$

(a) $y = x - 6$ (b) $y = 3x - 1$

(c) $y = -5x - 7$ (d) $y = -x + 8$

(e) $y = \frac{1}{2}x - 5$ (f) $y = -\frac{2}{3}x - \frac{1}{3}$

(a) $x - y = 6$

(b) $3x - y = 1$

(c) $5x + y = -7$

(d) $x + y = 8$

(e) $x - 2y = 10$

(f) $2x + 3y = -1$

For each of these equations, rearrange into the form $y = mx + c$ and find the gradient and y-intercept.

(a) $y = 6 + 2x$ (b) $y = 1 - 3x$

(c) $2y = 4x + 6$ (d) $3y = 12 - 6x$

(e) $x + y = 5$ (f) $3x + y = 7$

(g) $2x - y = 3$ (h) $4x = y - 2$

(i) $8x + 2y = 20$ (j) $12x + 4y = 16$

(k) $2y = 3x + 7$ (l) $3x + 4y = 9$

(m) $3x - 6y - 12 = 0$

(n) $5x - y - 1 = 0$

(a) $y = 2x + 6$ $m = 2$ $(0, 6)$

(b) $y = -3x + 1$ $m = -3$ $(0, 1)$

(c) $y = 2x + 3$ $m = 2$ $(0, 3)$

(d) $y = -2x + 4$ $m = -2$ $(0, 4)$

(e) $y = -x + 5$ $m = -1$ $(0, 5)$

(f) $y = -3x + 7$ $m = -3$ $(0, 7)$

(g) $y = 2x - 3$ $m = 2$ $(0, -3)$

(h) $y = 4x + 2$ $m = 4$ $(0, 2)$

(i) $y = -4x + 10$ $m = -4$ $(0, 10)$

(j) $y = -3x + 4$ $m = -3$ $(0, 4)$

(k) $y = \frac{3}{2}x + \frac{7}{2}$ $m = \frac{3}{2}$ $(0, \frac{7}{2})$

(l) $y = -\frac{3}{4}x + \frac{9}{4}$ $m = -\frac{3}{4}$ $(0, \frac{9}{4})$

(m) $y = \frac{1}{2}x - 2$ $m = \frac{1}{2}$ $(0, -2)$

(n) $y = 5x - 1$ $m = 5$ $(0, -1)$