

**SATPREP**

**Assignment : Linear equation in one variable**

**Solve each of the following equations**

(a)  $7x + 2 = -19$

(b)  $3x - 1/3 = 5$

(c)  $5x - 4 = 21$

(d)  $-7x = 21$

(e)  $18 - 7x = -3$

(f)  $3(x + 4) = 21$

(g)  $2x/3 - 3x/5 = 8$

(h)  $3x - 9 = 5x - 3$

(i)  $3(x - 3) = 4(2x + 1)$

**Solve each of the following equations and check your solution by substituting in the equation.**

(a)  $3x/2 - 10 = 1/2$

(b)  $x/2 - x/3 = 8$

(c)  $6x - 9 - 2(1 - x) = x + 9$

(d)  $2(x - 2) - 5(x - 5) = 4(x - 8) - 2(x - 2)$

(e)  $(2 - y)/(y + 7) = 3/5$

(f)  $(3x + 2)/(2x - 3) = -3/2$

(g)  $(x - 8)/3 = (x - 3)/5$

(h)  $0.25(4y - 3) = 0.5y - 9$

**Answer:**

**1.** (a) -3

(b)  $1\frac{7}{9}$

(c) 5

(d) -3

(e) 3

(f) 3

(g) 120

(h) -3

(i)  $-2\frac{3}{5}$

**2.**(a) 7

(b) 48

(c)  $20\frac{7}{8}$

(d)  $49\frac{5}{8}$

(e)  $-11\frac{7}{8}$

(f)  $5\frac{1}{12}$

(g)  $31\frac{1}{2}$

(h) -16.5

