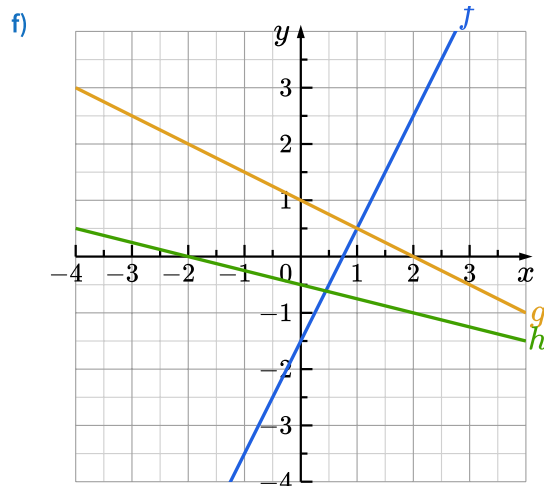
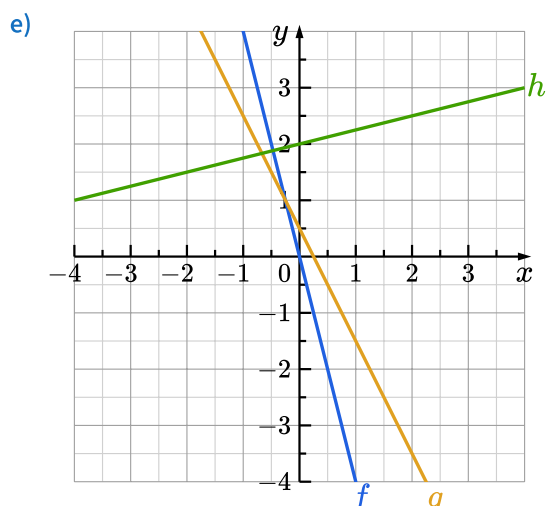
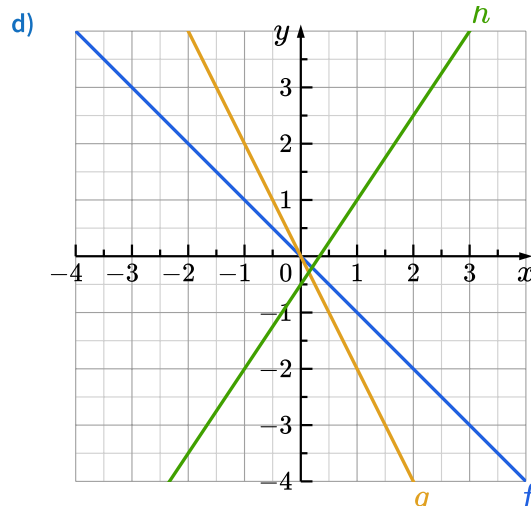
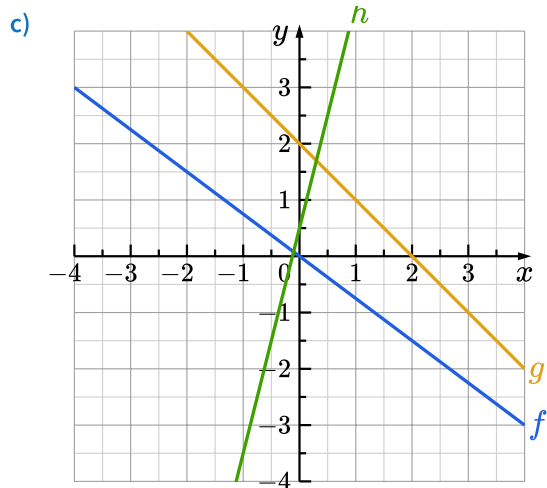
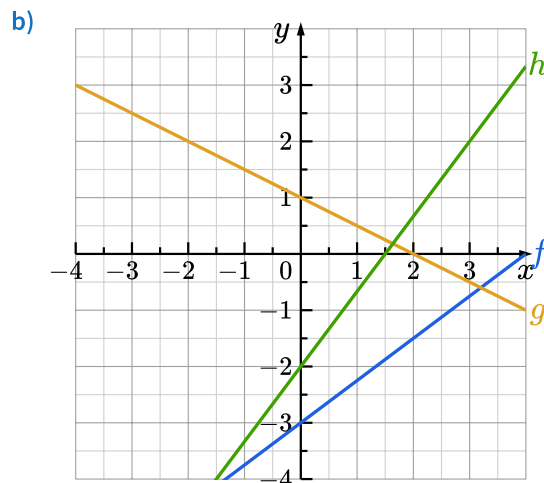
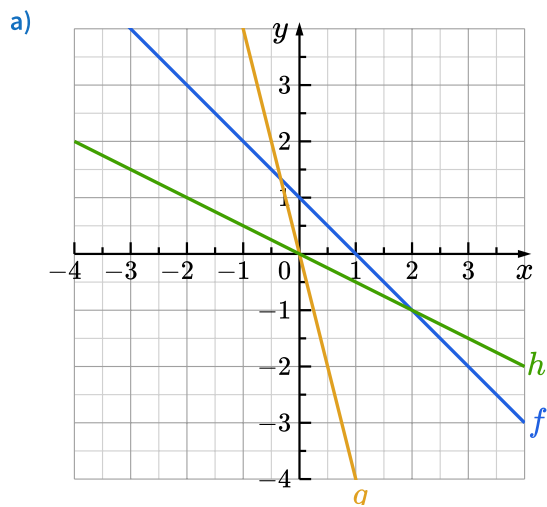
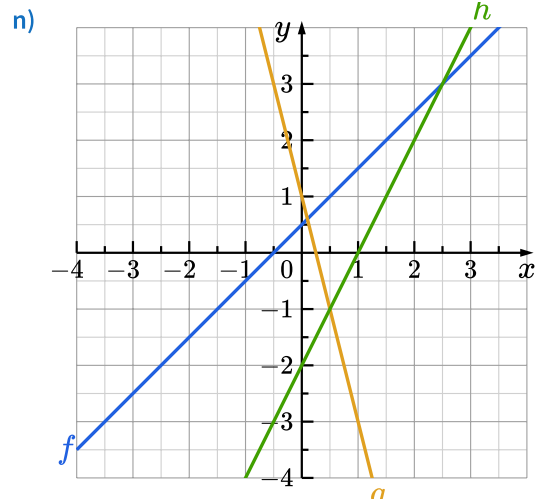
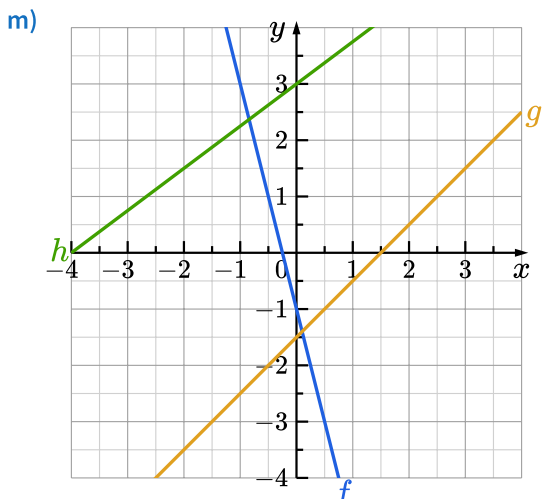
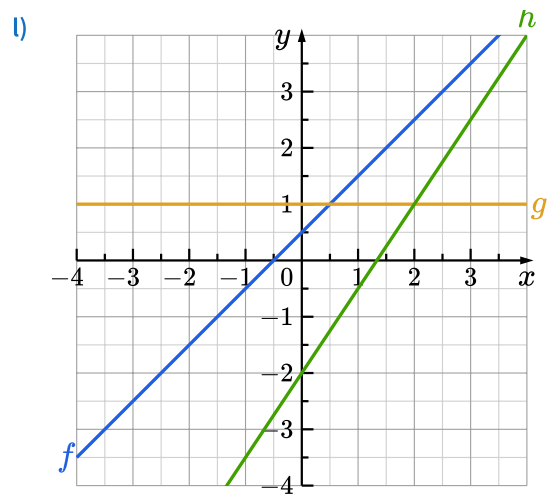
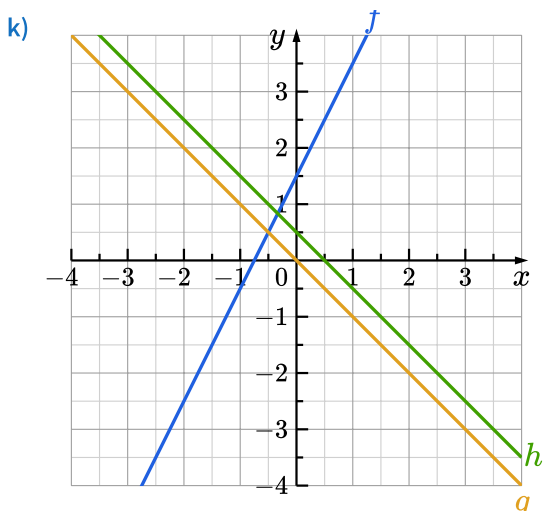
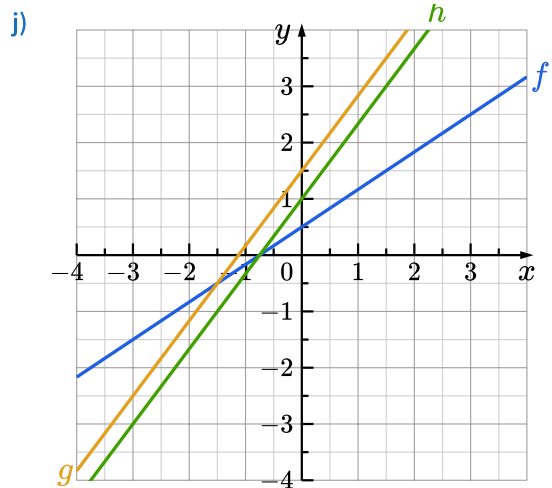
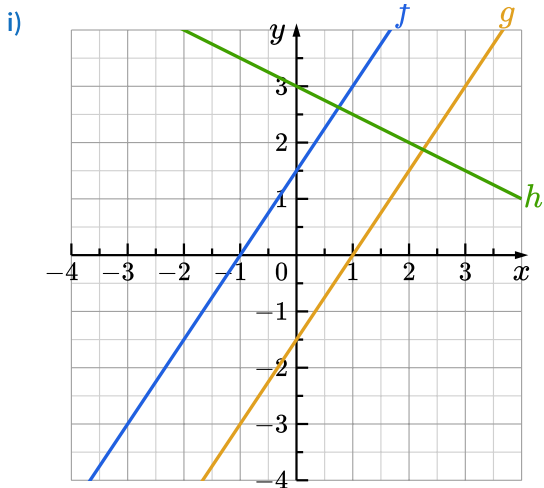
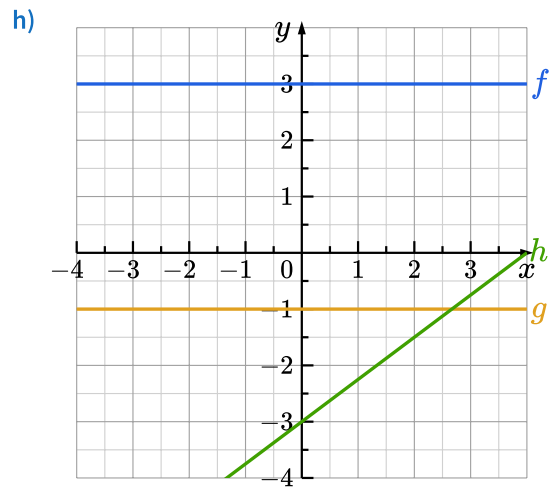
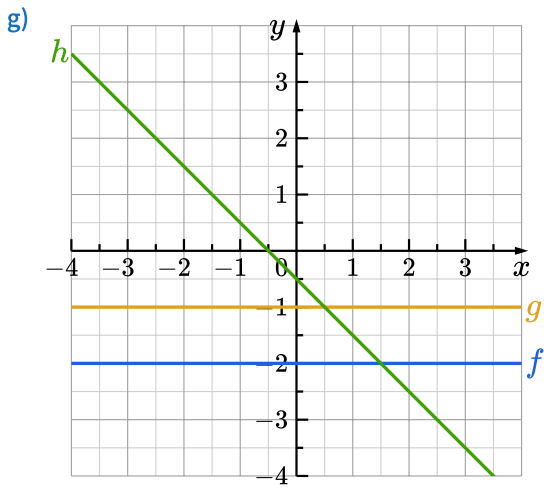


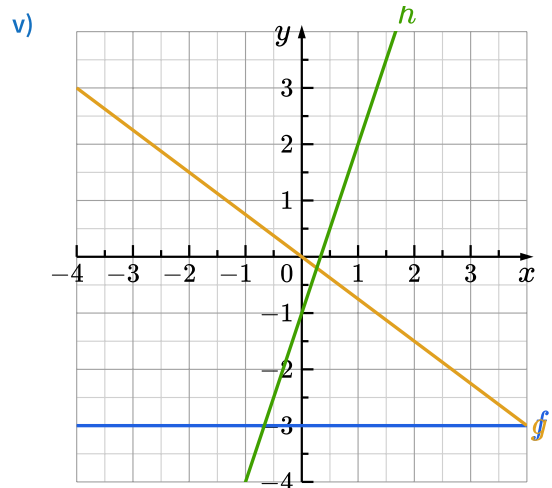
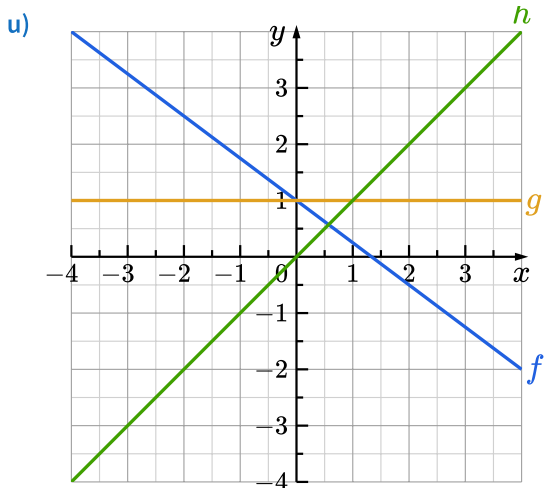
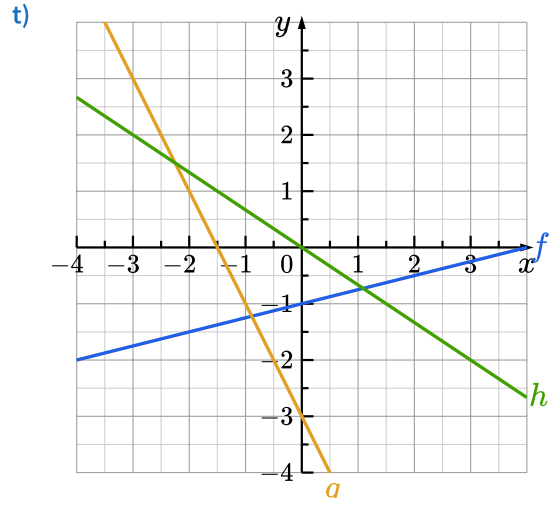
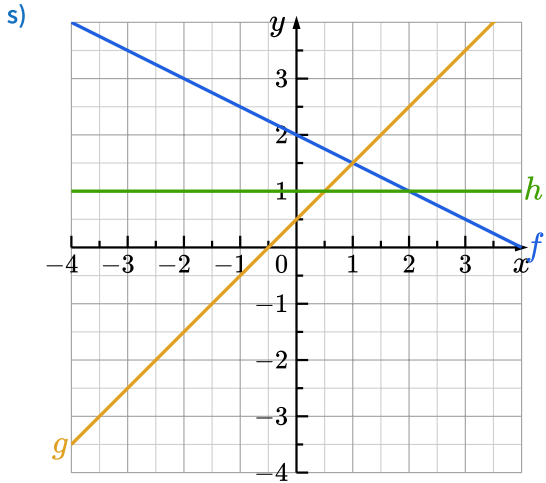
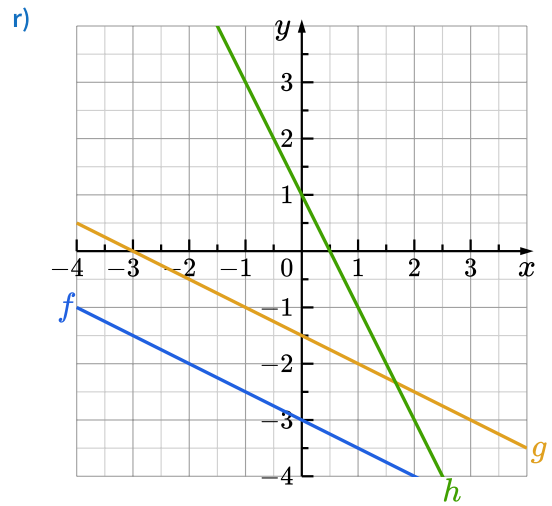
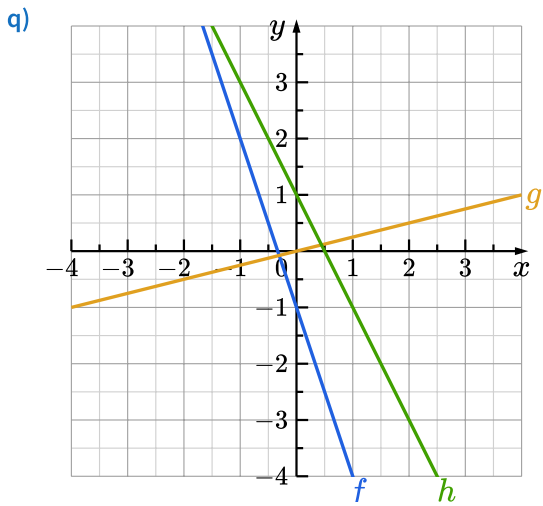
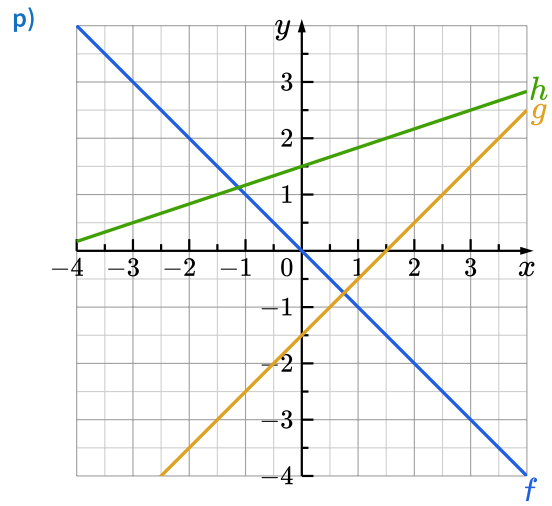
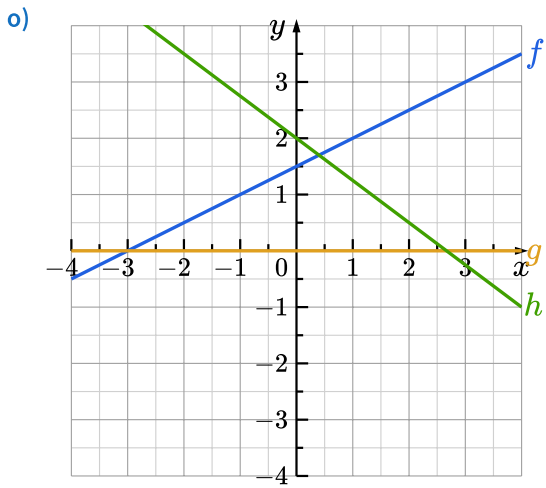
Aufstellen einer linearen Funktion

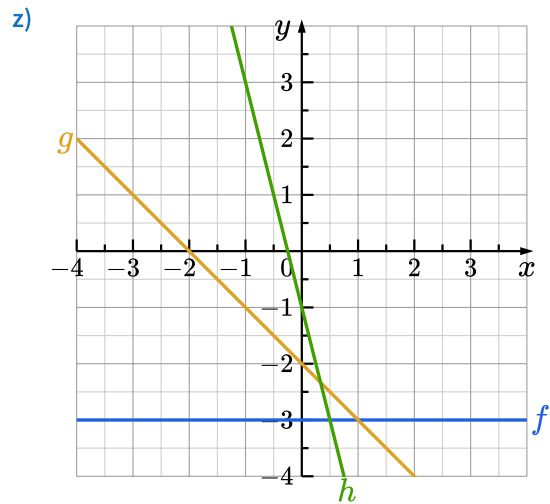
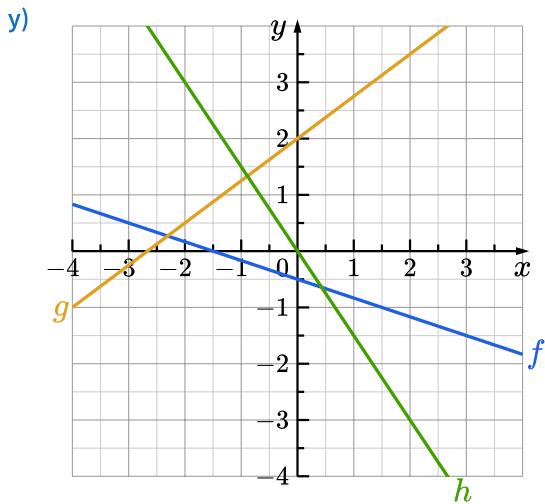
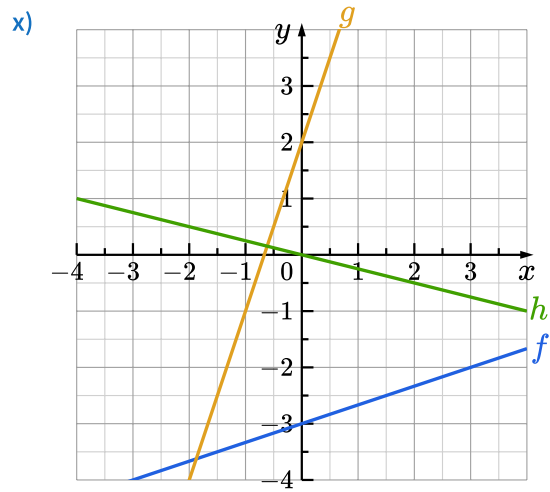
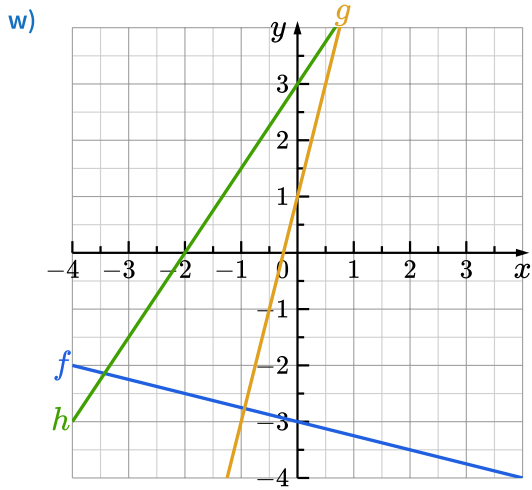
Aufgabe

Stelle anhand des Graphen die lineare Funktionsgleichung auf:









Tipp

Die allgemeine Form einer linearen Funktionsgleichung lautet $f(x) = mx + n$, mit dem Anstieg m und dem y-Achsenabschnitt n .

Lösung

a) $f(x) = -x + 1$
 $g(x) = -4x$
 $h(x) = -\frac{1}{2}x$

c) $f(x) = -\frac{3}{4}x$
 $g(x) = -x + 2$
 $h(x) = 4x + \frac{1}{2}$

e) $f(x) = -4x$
 $g(x) = -2x + \frac{1}{2}$
 $h(x) = \frac{1}{4}x + 2$

g) $f(x) = -2$
 $g(x) = -1$
 $h(x) = -x - \frac{1}{2}$

i) $f(x) = \frac{3}{2}x + \frac{3}{2}$
 $g(x) = \frac{3}{2}x - \frac{3}{2}$
 $h(x) = -\frac{1}{2}x + 3$

k) $f(x) = 2x + \frac{3}{2}$
 $g(x) = -x$
 $h(x) = -x + \frac{1}{2}$

m) $f(x) = -4x - 1$
 $g(x) = x - \frac{3}{2}$
 $h(x) = \frac{3}{4}x + 3$

o) $f(x) = \frac{1}{2}x + \frac{3}{2}$
 $g(x) = 0$
 $h(x) = -\frac{3}{4}x + 2$

q) $f(x) = -3x - 1$
 $g(x) = \frac{1}{4}x$
 $h(x) = -2x + 1$

s) $f(x) = -\frac{1}{2}x + 2$
 $g(x) = x + \frac{1}{2}$
 $h(x) = 1$

b) $f(x) = \frac{3}{4}x - 3$
 $g(x) = -\frac{1}{2}x + 1$
 $h(x) = \frac{4}{3}x - 2$

d) $f(x) = -x$
 $g(x) = -2x$
 $h(x) = \frac{3}{2}x - \frac{1}{2}$

f) $f(x) = 2x - \frac{3}{2}$
 $g(x) = -\frac{1}{2}x + 1$
 $h(x) = -\frac{1}{4}x - \frac{1}{2}$

h) $f(x) = 3$
 $g(x) = -1$
 $h(x) = \frac{3}{4}x - 3$

j) $f(x) = \frac{2}{3}x + \frac{1}{2}$
 $g(x) = \frac{4}{3}x + \frac{3}{2}$
 $h(x) = \frac{4}{3}x + 1$

l) $f(x) = x + \frac{1}{2}$
 $g(x) = 1$
 $h(x) = \frac{3}{2}x - 2$

n) $f(x) = x + \frac{1}{2}$
 $g(x) = -4x + 1$
 $h(x) = 2x - 2$

p) $f(x) = -x$
 $g(x) = x - \frac{3}{2}$
 $h(x) = \frac{1}{3}x + \frac{3}{2}$

r) $f(x) = -\frac{1}{2}x - 3$
 $g(x) = -\frac{1}{2}x - \frac{3}{2}$
 $h(x) = -2x + 1$

t) $f(x) = \frac{1}{4}x - 1$
 $g(x) = -2x - 3$
 $h(x) = -\frac{2}{3}x$

$$\begin{aligned} \text{u)} \quad f(x) &= -\frac{3}{4}x + 1 \\ g(x) &= 1 \\ h(x) &= x \end{aligned}$$

$$\begin{aligned} \text{w)} \quad f(x) &= -\frac{1}{4}x - 3 \\ g(x) &= 4x + 1 \\ h(x) &= \frac{3}{2}x + 3 \end{aligned}$$

$$\begin{aligned} \text{y)} \quad f(x) &= -\frac{1}{3}x - \frac{1}{2} \\ g(x) &= \frac{3}{4}x + 2 \\ h(x) &= -\frac{3}{2}x \end{aligned}$$

$$\begin{aligned} \text{v)} \quad f(x) &= -3 \\ g(x) &= -\frac{3}{4}x \\ h(x) &= 3x - 1 \end{aligned}$$

$$\begin{aligned} \text{x)} \quad f(x) &= \frac{1}{3}x - 3 \\ g(x) &= 3x + 2 \\ h(x) &= -\frac{1}{4}x \end{aligned}$$

$$\begin{aligned} \text{z)} \quad f(x) &= -3 \\ g(x) &= -x - 2 \\ h(x) &= -4x - 1 \end{aligned}$$