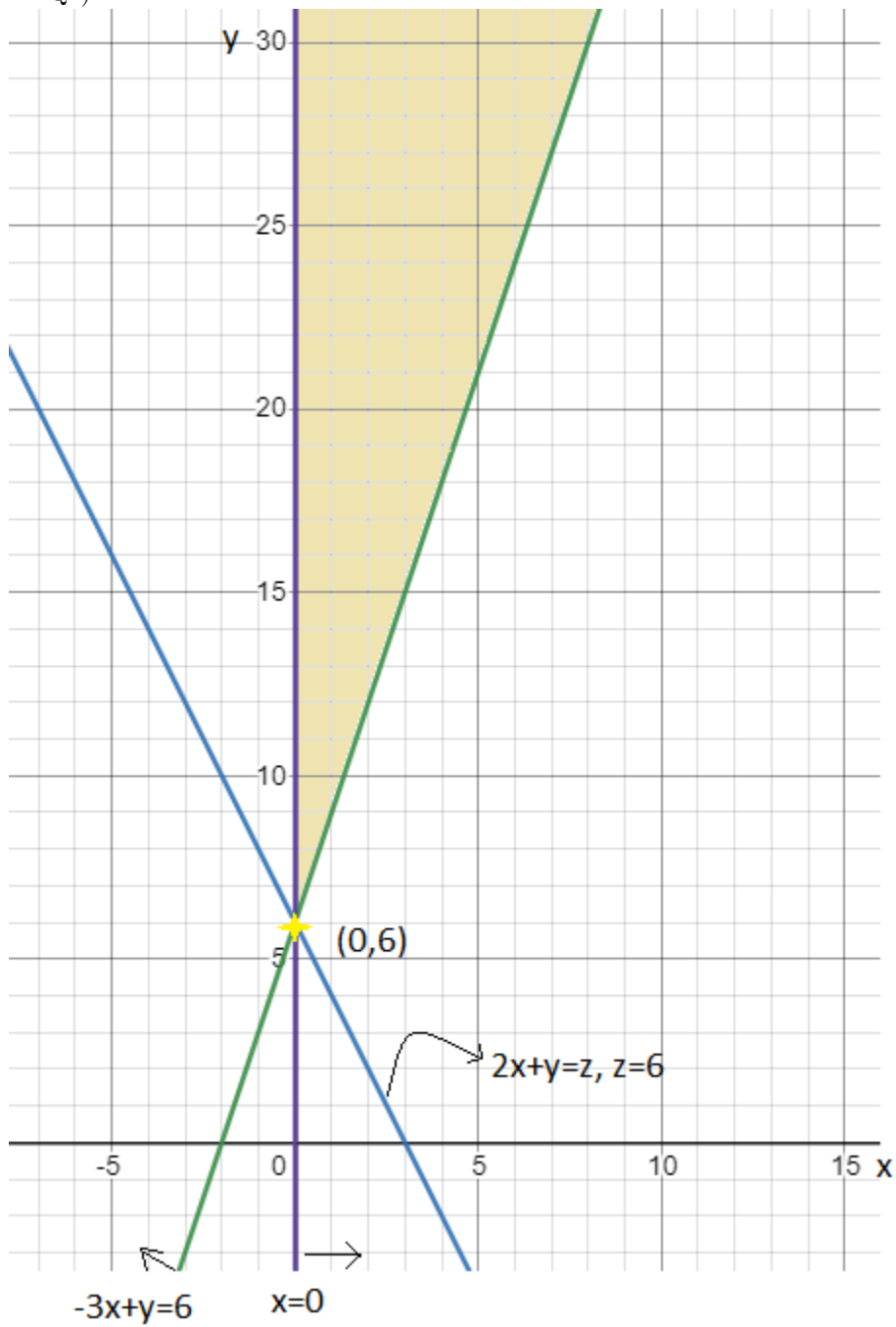


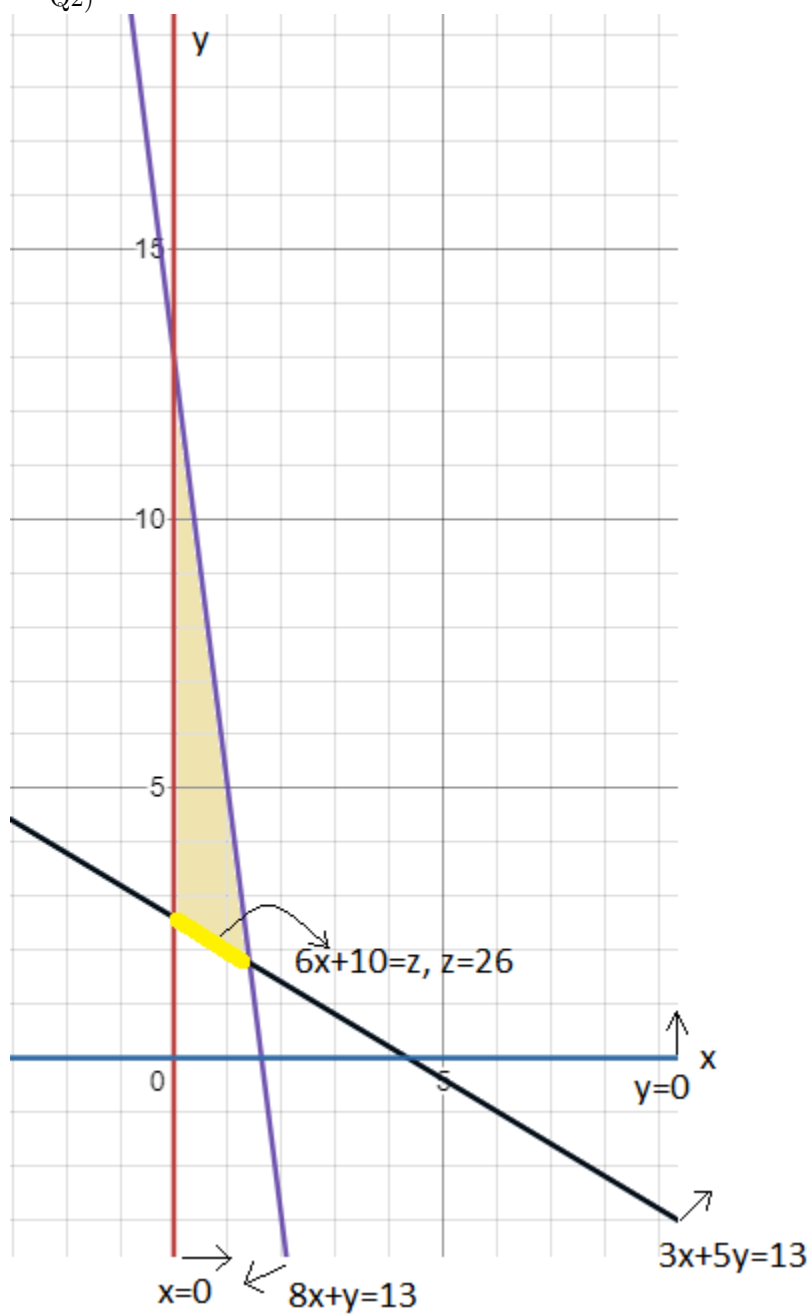
IE 400: Principles of Engineering Management
Study Set 2-Key

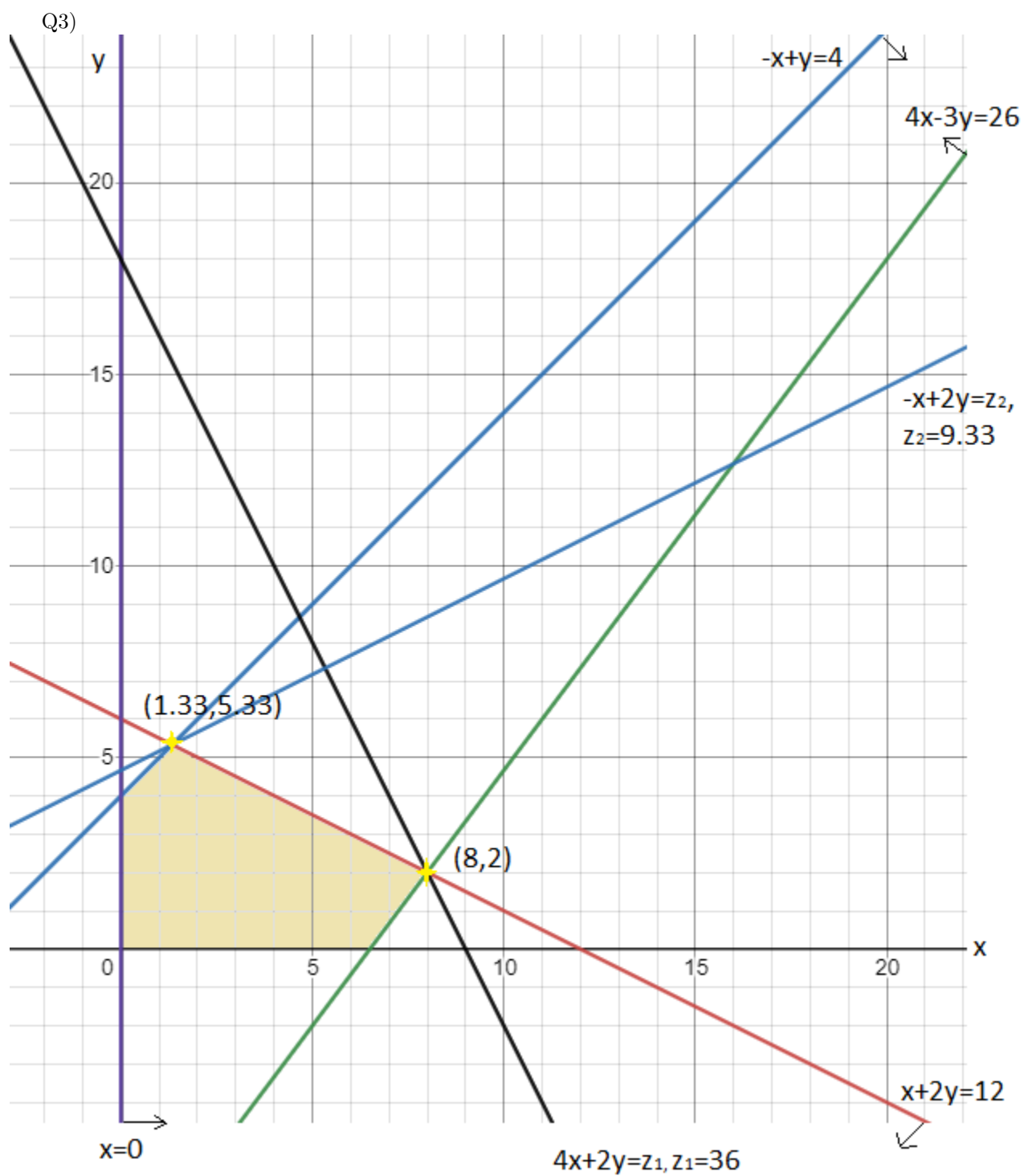
Spring 2021-2022

Q1)



Q2)





Q4)

$$a_1x + b_1y = z_1, \\ a_1=3 \quad b_1=1 \quad z_1=-2$$

y

$$-3x + y = 6$$

8

6

4

2

0

-2

-4

x=0

2

4

x

$$a_2x + b_2y = z_2, \\ a_2=1 \quad b_2=-3 \quad z_2=0$$

as you go on the red
direction z_2 converges
to $-\infty$. (Unbounded
solution)

(0,-2)

$$x + 2y = -4$$

Q5)

