PC11 Types of Numbers Assignment Solutions

1. Is 0 a natural number?
   No

2. Is rational?
   a. 4.5
      Yes $\frac{9}{2}$

   b. $\frac{\pi}{2}$
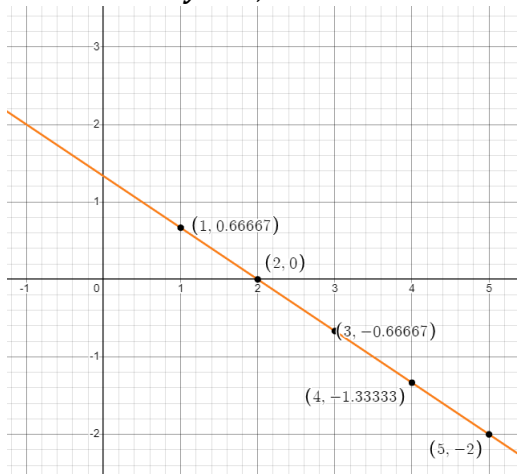   No

   c. 7
      Yes

   d. $2.\overline{5}$
      Yes

   e. $\sqrt{289}$
      $= 17$
      Yes

3. Write $0.\overline{4}$ in the form $\frac{a}{b}$
   $\frac{4}{9}$

4. Sketch $2x + 3y = 4, x \in \mathbb{Z}^+$

5. Is 1 a prime number?
   No

6. Is -216 a perfect cube?
   Yes