

1. Which sets does each of the following belong to (**N, W, Z, Q, Q' and R**): [4]

a) 3 _____

b) $-5.\bar{3}$ _____

c) π _____

d) 0 _____

2. Given the set $\{0,1,3,4,7,9\}$ [3]

a) How many elements are in the set? _____

b) Is the set $\{1,2,3\}$ a subset? _____c) Is the set $\{ \}$ a subset? _____

3. Determine the limit for each sequence (if there is one). [3]

a) $5.12, 5.1212, 5.121212, \dots$ b) $3, 6, 12, 24, \dots$ c) $-10, -2, -0.4, -0.08, \dots$

4. Evaluate. [12]

a) $2 - 5$ b) $-2 + (-1)$ c) $(-2)(-6)$ d) $\frac{-24}{4}$

e) $2 - 3 \times 4^2$

f) $2 + 3[4 - (3)(-2)]$

g)
$$\frac{5-2(-3)+(-1)}{-(16)\div 4(-2)}$$