

Q. 1

State whether the given set is finite or infinite

(1, 2, 3, 4, ...)

Infinite

(1, 2, 3, 4)

Finite

(-3, -2, -1, 0, 1, 2)

Finite

(20, 30, 40, 50, ..., 200)

Finite

Which of the following sets is empty?

Set of counting numbers between 5

set of odd numbers between 7 & 19

Set of odd numbers between 7 & 9

Set of even numbers that are not divisible by 2.

Q2 Q3

3 State which pair of sets given below are equal sets and which are equivalent.

(i)  $\{3, 5, 7\}$  and  $\{5, 3, 7\}$

A Equal

(ii)  $\{8, 6, 10, 12\}$  and  $\{3, 3, 4, 6\}$

A Equivalent

(i)  $\{7, 2, 2\}$  and  $\{2, 2, 7\}$

4- Equal

(ii)  $\{2, 4, 6, 8, 10\}$  and  $\{a, b, d, e, m\}$

A Equivalent

Q State which of the following are finite-sets and which are infinite;

(a) Set of integers

Infinite

(b) Multiples of 5

Infinite

(c) Fractions between 1 and 2

Infinite

(ii) (Number of people in India)

Finite

(iii) Set of trees in the world

Infinite

(iv) Set of leaves on a tree

Finite

(v) set of children in all the schools

of Delhi

Finite

(vi)  $C = \{1, 2, 3, 4, 5, 6, 7, 8\}$

Infinite

(vii)  $C = \{1, 2, 3, 4, 5, 6, 7, 8, \dots\}$

infinite

4. (Number of points in a line segment of 4 cm long).

A- Infinite

5. State whether or not the following sets are empty.

(i) (Prime numbers divisible by 2)

A- Not empty

(ii) (Negative natural numbers)

A- Empty

(iii) Women with height 5 metres

A-