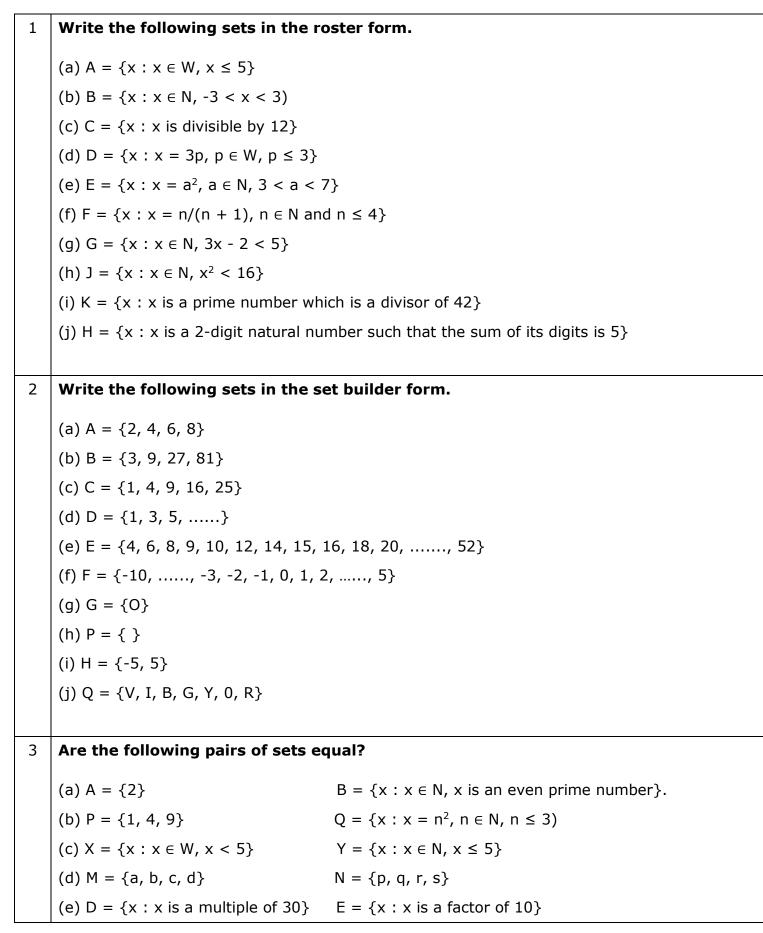
INDIAN SCHOOL AL WADI AL KABIR

DEPARTMENT OF MATHEMATICS 2023 – 2024

Work Sheet -- Class XI



<u>SETS - 1</u>





4	Find the cardinal number of the following sets.
	(a) $A = \{x : x \in N, 2 < x < 7\}$
	(b) B = {x : $n \in N, x = n^2, n < 3$ }
	(c) The set of months in a year
	(d) C = {x : $x \in Z+, x < 100$ }
	(e) D = {x : x = n^3 , n \in W, n < 5}
	(f) The set of letters in the word MALAYALAM
5	Write the following in interval form.
	1) $\{x: x \in \mathbb{R}, -4 < x \le 6\}$
	2) {x: $x \in R, 0 \le x < 7$ }
	3) $\{x: x \in R, 3 \le x \le 4\}$
6	Write all subset of the following
	1) {1, 2}
	2) {a, b, c}
	3) Φ
7	Let A = {1, 2, {3, 4}, s, d, θ }, Which of the following statements are true / false and why?
	$(1) 3 \in A$
	(2) $\{1, \{3, 4\}\} \in A$
	(3) $\{1, 2, 3\} \subset A$
	$(4) \Phi \in A$
	(5) $1 \subset A$ (1 score each)
8	Show by Venn diagrams the relationship between the following
	Let $M = {Natural numbers between 10 and 40; each divisible by 3}$
	$N = \{Natural numbers upto 40; each divisible by 4\}.$
	(i) Write each in roster form.
	(ii) Draw a Venn-diagram showing the relationship between sets M and set N.