

Name: \_\_\_\_\_

Date: \_\_\_\_\_

## QUIZ – SETS

1. (5%) Standard deviation measures the \_\_\_\_\_ of the data.
2. (10%) List the elements of the set  $\{x \mid 2 \leq x < 7, x \in N\}$  \_\_\_\_\_
3. (10%) Given set  $\{A, B, C\}$ , List all its possible subsets:
4. (5%) Given the set  $\{3, 7, B, A\}$ . How many possible proper subsets does it have?
5. (20%) Given the sets  $A = \{5, 8, 12, 16\}$ ,  $B = \{-2, 7, 12, 22, 123\}$  and  $C = \{0, 8, 9, 12, 16, 24, 23, 123\}$  Find:  

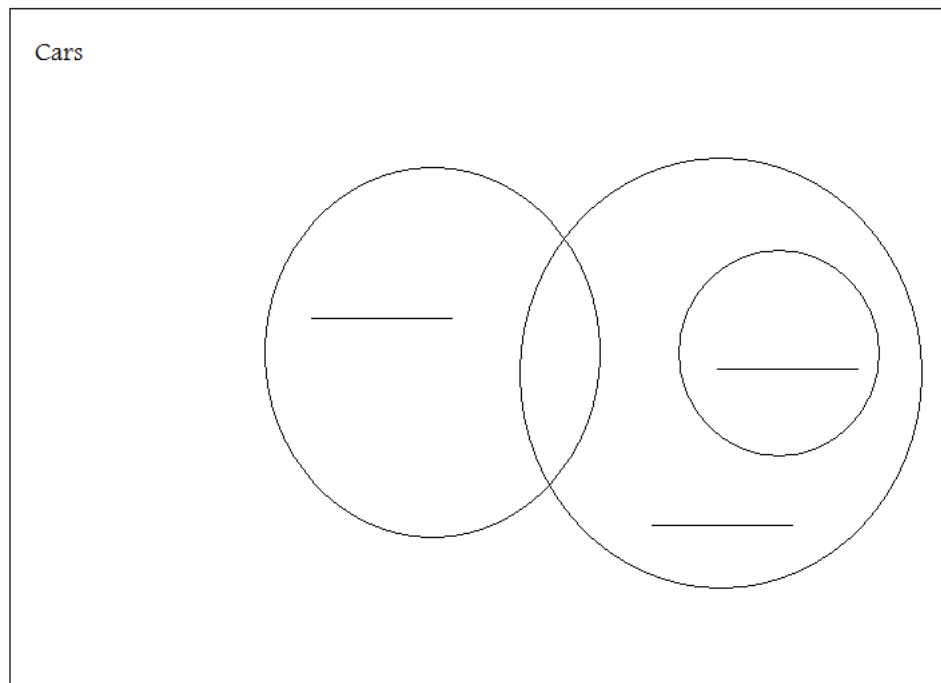
(4%)  $A \cup B =$

(4%)  $B \cap C =$

(4%)  $A \cap C =$

(4%)  $A \cap B \cap C =$

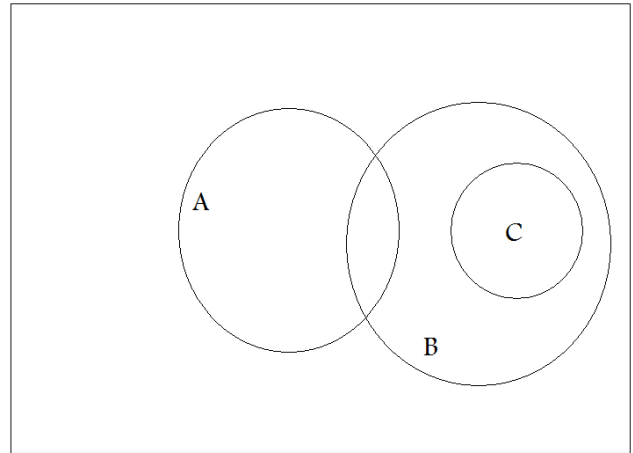
(4%)  $(A \cap B') \cup C =$
6. (15%) Given the following Venn Diagram describing cars. Fill the blanks with possible subsets.



7. (10%) Given the Venn diagram, shade:

a. (5%)  $A \cap B$

b. (5%)  $B \cap C$



8. (25%) In a certain company with 60 workers there are three main sections. ID Section (I), Administration (A) and Finance (F).

5 workers work in all 3 sections

9 workers work in Administration only

7 workers work in Finance only

20 workers work in ID

10 workers work in ID and Finance only

11 workers work in Administration and Finance only

2 workers work in Administration and ID only

- a. (7%) Organize this info in the following Venn Diagram

- b. (9%) Find the number of workers who work in ID only

- c. (9%) many workers do not work in any of the 3 sections

