

(OR)

- b) Give the constructional details and characteristics of different types of Generators and alternators used in automobiles.

23. a) With necessary circuit diagram, explain in detail about different Ignition systems.

(OR)

- b) With neat diagram, explain the operation of different types of spark plugs used in the ignition system of automobiles.

24. a) Compare Electronically assisted ignition system with full electronic ignition system.

(OR)

- b) Explain in detail about digital ignition systems. What are the different strategies used to control the digital ignition system.

25. a) Give the theory and constructional details of various dash board instruments in automotive systems.

(OR)

- b) With necessary diagram, explain in detail about different electrical and electronic fuel lift pumps used in automobiles.
