

SECTION-B

Note: Short answer type questions. Attempt any six questions out of Eight questions. $(6 \times 5 = 30)$

- Q.11 Draw the layout of all electric vehicle drive train
- Q.12 Explain power flow control in Electric drive train topology in brief
- Q.13 Explain a method of speed and acceleration control in EVs.
- Q.14 A motor can also work as generator. Justify the statement.
- Q.15 Describe the working of brushed type DC motor.
- Q.16 Explain five advantages of Electric drive train topology.
- Q.17 Discuss the social and environmental importance of hybrid electric vehicles
- Q.18 Explain the working of power converters.

SECTION-C

Note: Long answer type questions. Attempt any one questions out of two questions. $(10 \times 1 = 10)$

- Q.19 Explain advantages and disadvantages of Electric drive train topology in detail.
- Q.20 Make a list of electric drive components and describe the functions of each component.

No. of Printed Pages : 2

Roll No.

188654

DVOC (Level - 5)

Sem - I / Auto, Servicing, AMT)

Subject : Modern Electric & Hybrid Vehicles

Time : 2 Hrs.

M.M. : 50

SECTION-A

Note: Very short answer type questions . Attempt all ten question $(10 \times 1 = 10)$

- Q.1 Write any two disadvantages of Electric drive train topology.
- Q.2 Give any two manufactures of electric vehicles.
- Q.3 What is prime function of shock absorbers in an electric vehicle ?
- Q.4 Tell any two electric drive components used in electric vehicles.
- Q.5 Write any two disadvantages of Hybrid electric drive train topology
- Q.6 Write the function of generator.
- Q.7 Define hybrid electric vehicle
- Q.8 What is drive train?
- Q.9 In regenerative Braking system , kinetic energy of vehicle is converted into ____ energy.(Fill in the blanks)
- Q.10 Name the piezoelectric material used for regenerative braking.