

April 2019

Time – Three hours
(Maximum Marks: 75)

*(N.B: (1) Q.No. 8 in PART – A and Q.No. 16 in PART – B are compulsory.
Answer any FOUR questions from the remaining in each PART – A
and PART – B*

(2) Answer division (a) or division (b) of each question in PART – C.

*(3) Each question carries 2 marks in PART – A, 3 marks in Part – B
and 10 marks in PART – C.]*

PART – A

1. How the vehicle bodies are classified?
2. What is hatchback?
3. How the bus bodies are classified?
4. What is articulated bus?
5. Name the materials used for manufacturing of seats.
6. Define low drag body.
7. How will you avoid pitting?
8. What is galvanization?

PART – B

9. Discuss about drivers visibility test.
10. List out the general safety measures adopted for passengers safety.
11. Describe vacuum coating process.
12. What is draw bar trailer?
13. Mention the seat angles for driver seat and passengers seat in a commercial vehicle.
14. Give any two effects of side winds.
15. Explain about any three body repair tools.
16. What is the use of luxury coach bus?

[Turn over....

PART - C

17. (a) (i) Explain crumple zone body design.
(ii) What is saloon? Explain its types with suitable sketches.

(Or)

- (b) Explain airbag with sketches.

18. (a) Explain any two classifications of buses and coaches based on body shape.

(Or)

- (b) Explain with a neat sketch about bus body cross section and label the parts and explain the same.

19. (a) Briefly explain about the different types of medium commercial vehicle bodies.

(Or)

- (b) With neat sketches briefly explain about passengers push backseat and comfortable seat angle.

20. (a) Explain briefly about the effects of various forces on a vehicle.

(Or)

- (b) Explain in detail body optimisation technique for minimum drag.

21. (a) Explain the different types of corrosion occurs in automotive bodies.

(Or)

- (b) Explain any three types of painting methods with neat sketches.
