QP CODE: Reg. No : ……..

Name: ……

MAHATMA GANDHI UNIVERSITY, KOTTAYAM

MGU-UGP (HONOURS) REGULAR EXAMINATION MARCH 2026

FOURTH SEMESTER

DISCIPLINE SPECIFIC ELECTIVE (DSE)- MG4DSEHISA00 SCIENCE AND MODERNITY

(2024 ADMISSION ONWARDS)

Duration: 2 hours **Maximum Marks: 70**

Remember (K), Understand (U), Apply (A), Analyse (An), Evaluate (E), Create (C), Skills (S), Interest (I), and Appreciation (Ap)

Students should attempt at least one question from each course outcome to enhance their overall outcome attainability

Part A

Short Answers

Answer any 10 questions

Each question carries 2 marks

1. Recall the significance of *Origin of Species* [K]/ [CO 3]

2. Who was Francis Bacon? [K]/ [CO1]

3. Define Mechanical model of nature [U]/ [CO 3]

4. Remember the invention of Telescope [K]/ [CO 1]

5. Who was Herbert Spencer? [K]/ [CO 2]

6. What is Royal Society? [K]/ [CO 4]

7. Define scientific temper [U]/ [CO 2]

8. Define Method in science [U]/ [CO 1]

9. What was Witchcraft? [U]/ [CO 4]

10. Define Developmentalism [U]/ [CO 5]

11. Make a note on the invention of Steam engine [U]/ [CO 1]

12. Define Eurocentrism [U]/ [CO 5]

(2*10= 20)

Part B

Short Essay

Answer any 6 questions

Each question carries 5 marks

13. How did the disciplinary boundaries emerge in the nineteenth century? Explain. [U]/ [CO 1]

14. Trace out the roll of capitalism in the transformation of little science to big science [An]/ [CO 2]

15. Examine the methodological characteristics of new science [An]/ [CO 1]

16. Elaborate the influence of Protestant ethics in the formation of modern science [An]/ [CO 3]

17. Discuss the critique of social movements on development and modernisation [E]/ [CO 5]

18. Outline the historical factors for the institutionalisation of the new science [U]/ [CO 2]

19. How was the understanding about nature transformed under the modern science? [An]/ [CO 3]

20. Explain the technological changes occurred during the Industrial Revolution [U]/ [CO 4]

21. Discuss the contribution of Robert Boyle in the standardisation of scientific method. [U]/ [CO 1]

22. How did the Europe create the orient through 'scientific knowledge'? Substantiate. [E]/ [CO 4]

(5*6=30)

Part C

Essay questions

Answer any two questions

Each question carries 10 marks

23. Evaluate *The Huxley-Wilberforce Debate* on Evolution [E]/ [CO 3]

24. How did the scientific theories on race in the nineteenth century justify the colonial dominance? [E]/ [CO 4]

25. Critically evaluate the nexus between the Newtonian physics and the rise of capitalism [An]/ [CO 2]

26. Substantiate the scientific revolution as a historical nomenclature [A]/ [CO1]

(10*2=20)