

PARUL UNIVERSITY
FACULTY OF APPLIED SCIENCE
M.Sc. Summer 2018-19 Examination

Semester: 2
Subject Code: 11207154
Subject Name: Forensic Ballistics

Date: 08/04/2019
Time: 10:30 am to 01:00 pm
Total Marks: 60

Instructions:

1. All questions are compulsory.
2. Figures to the right indicate full marks.
3. Make suitable assumptions wherever necessary.
4. Start new question on new page.

- Q.1. A) Essay type/ Brief note (4x2) (Each of 04 marks) (08)**
 (a) Describe the classification and characteristics of firearms.
- Q.1. B) Answer the following questions (Any two) (04)**
 (a) Short note (Each of 02 marks)
 1. forensic ballistics.
 2. Country made firearm. (04)
 (b) Comparison of fired cartridge case. (04)
 (c) Short note on types of cartridge case. (04)
- Q.2. A) Answer the following questions. (04)**
 (a) Fill in the blanks. (Each of 02 marks)
 1. Write a brief on bolt action mechanism.
 2. Write a note flint lock firearm
 (b) Write a note on classification of bullet. (04)
- Q.2. B) Answer the following questions (Any two) (03)**
 (a) Write a note on NAA. (03)
 (b) Write a note on Shot gun family. (03)
 (c) Explain the effect of corrosion and erosion on firearm. (03)
- Q.3. A) Essay type/ Brief note (4x2) (Each of 04 marks) (08)**
 (a) Write method for collection of GSR.
 (b) Explain the attributes of internal ballistics.
- Q.3. B) Answer the following questions (Any two) (04)**
 (a) Define trajectory. Explain with figure the trajectory drop in the flight of the projectile. (04)
 (b) Describe factors affecting ricochet. (04)
 (c) Short note on forensic significance of Electron microscopy. (04)
- Q.4. A) Answer the following questions. (04)**
 (a) Short note/ Brief note (2x2) (Each of 02 marks)
 1. Application of AAS.
 2. What is muzzle velocity? Factors affecting muzzle velocity.
 (b) Write a note on IBIS. (04)
- Q.4. B) Answer the following questions (Any two) (03)**
 (a) Short note/ Multiple choice questions. (Each of 01 marks) (03)
 1. Which gun has two shallow grooves at the muzzle end?
 2. Define range of fire.
 3. Which instrument is used to measure the pitch of rifling firearm?
 (b) Explain the shot gun injury. (03)
 (c) What is GSR? Write the mechanism of formation of GSR and its Composition in detail. (03)