

S.S.R. DEGREE COLLEGE, (AUTONOMOUS)

NIZAMABAD (C.C:5029)

I SEMESTER INTERNAL ASSESSMENT I EXAMINATIONS

PAPER – III, CLINICAL LABORATORY PRACTICE (MLT)

QUESTION BANK

I. Multiple Choice Questions

1. Which of the following is a primary goal of laboratory maintenance? ()
A. Reducing staff workload
B. Ensuring equipment longevity
C. Increasing patient admission
D. Promoting laboratory automation
2. What is the ideal temperature for storing most reagents in a clinical laboratory? ()
A. 0°C B. 2–8°C C. 25–30°C D. -20°C
3. Which type of water is typically used for reagent preparation in laboratories? ()
A. Tap water B. Distilled water
C. Deionized water D. Rainwater
4. A biosafety cabinet must be cleaned using: ()
A. Alcohol-based sanitizer B. Soap and water
C. Disinfectant like 70% ethanol D. Tap water only
5. Calibration of laboratory equipment is done to: ()
A. Change machine parts B. Improve appearance
C. Ensure accuracy and precision D. Save electricity
6. What is the first step in routine equipment maintenance? ()
A. Lubrication B. Calibration
C. Powering off the equipment D. Cleaning
7. Autoclaves are maintained by monitoring: ()
A. Gas level B. Pressure and temperature
C. Voltage supply D. Vibration level
8. Which of the following is a preventive maintenance activity? ()
A. Replacing a broken rotor B. Cleaning the microscope lens
C. Fixing a damaged pipette D. Ignoring minor faults
9. The term “preventive maintenance” refers to: ()
A. Emergency repair
B. Routine service to prevent failures
C. Calibration of balances
D. Equipment disposal
10. To prevent contamination, work surfaces should be disinfected: ()
A. Monthly B. Before and after each shift
C. Only after spills D. Once a week
11. What is the role of a UPS in the laboratory? ()
A. Provides additional storage B. Maintains temperature
C. Supplies backup power D. Enhances internet speed
12. Which of the following documents is essential for equipment maintenance? ()
A. Attendance sheet B. Maintenance logbook
C. Lab timetable D. Incident report

- A. Reduce employee salary B. Maintain consistency and safety
C. Increase patient turnover D. Simplify billing
22. How often should refrigerators storing biological samples be monitored? ()
A. Once a day B. Weekly C. Monthly D. Yearly
23. An instrument showing inconsistent results should be: ()
A. Ignored B. Used as-is
C. Reported and serviced D. Recalibrated by a student
24. Which of the following ensures safety in handling biohazardous materials? ()
A. Color-coded bins B. Proper labeling
C. PPE D. All of the above
25. Who is responsible for laboratory maintenance? ()
A. Only the lab manager B. External maintenance team
C. Every lab staff member D. Only equipment vendors

II. FILL IN THE BLANKS

1. The process of ensuring that laboratory results are accurate and reliable is called _____.
2. In the clinical laboratory, PPE stands for _____.
3. The universal precautions recommend that all human specimens be treated as if they are _____.
4. The liquid portion of blood after clotting is called _____.
5. The liquid portion of anticoagulated blood is called _____.
6. The acronym *SOP* stands for _____.
7. The device used to separate components of blood by spinning is called a _____.

8. The concentration of hydrogen ions in a solution is expressed as _____.
9. The normal body temperature in Celsius is approximately _____.
10. The primary purpose of a biosafety cabinet is to protect the _____.
11. The waste from a microbiology lab containing infectious agents should be autoclaved at _____ °C for _____ minutes.
12. The internationally recognized symbol for biological hazards is called the _____ symbol.
13. In hematology, EDTA acts as an _____.
14. In serology, the test used to detect HIV antibodies is called _____.
15. The process of comparing a measurement to a known standard is called _____.
16. In microscopy, the lens closest to the specimen is called the _____ lens.
17. The most common temperature for incubating bacterial cultures is _____ °C.
18. In a chemical laboratory, acids should always be added to _____ and never the reverse.
19. The process of removing all forms of life, including spores, is called _____.
20. The quality assurance program that monitors the entire testing process is abbreviated as _____.
21. In the laboratory, the abbreviation *MSDS* refers to _____.
22. The branch of laboratory science dealing with blood group determination is called _____.
23. The term used for the smallest amount of a substance that can be reliably measured is _____.
24. The layer of white cells seen between plasma and red cells after centrifugation is called the _____ coat.
25. The purpose of running control samples alongside patient samples is to ensure _____ of results.

III. Descriptive Questions

1. Why is regular calibration of laboratory equipment important, and how often should it be performed?
2. List three preventive maintenance steps for a laboratory centrifuge.
3. What is the recommended procedure for cleaning and disinfecting a biosafety cabinet after use?
4. Explain the importance of maintaining proper temperature in laboratory refrigerators and freezers.
5. Why should laboratory instruments be serviced only by trained personnel, and what risks occur if untrained staff attempt repairs?