

## **School of Medical and Allied Sciences**

B.Sc Medical Lab Technology Semester End Examination - Jun 2024

Duration: 180 Minutes Max Marks: 100

## Sem VI - BMLS6004 - Cytopathology

General Instructions
Answer to the specific question asked
Draw neat, labelled diagrams wherever necessary
Approved data hand books are allowed subject to verification by the Invigilator

1)	Define telepathology/telecytology and elucidate its function in digital cytopathology, highlighting its role in remote diagnosis and consultation.	K1(2)
2)	Demonstrate the process of conducting an aspiration cytology procedure, including sample collection and interpretation.	K2(4)
3)	Summarize and explain the impact of advanced techniques like molecular cytology and immunocytochemistry on enhancing the specificity and sensitivity of cytological diagnoses.	K2(6)
4)	Organize the various enzyme staining techniques used in diagnostic cytopathology, categorizing them based on the enzymes they detect and their respective diagnostic implications.	K3(9)
5)	Organize a workflow for conducting the Papanicolaou technique in a cytology laboratory, including specimen collection, staining, and interpretation of results.	K3(9)
6)	Justify the importance of Cryostat sectioning in diagnostic cytopathology and its applications.	K5(10)
7)	Categorize the indications for aspiration cytology and classify its utility in different medical specialties.	K4(12)
8)	Evaluate the utility of enzyme cytochemistry in differentiating between benign and malignant cells in cytological specimens.	K5(15)
9)	Evaluate the effectiveness of telepathology/telecytology systems in facilitating timely diagnosis and treatment decisions for cytological specimens.	K5(15)
10)	Design a telepathology/telecytology system for remote consultation and diagnosis of cytological specimens, considering factors such as image transfer, data security, and quality assurance.	K6(18)