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MANIPAL ACADEMY OF HIGHER EDUCATION
MD (PATHOLOGY) DEGREE EXAMINATION – May 2026
PAPER I (NEW SCHEME)

Monday, May 18, 2026

Time: 14:00 – 17:00 Hrs.

Max. Marks: 100

✍ **Answer ALL the questions.**

✍ **Illustrate your answers with diagrams wherever necessary.**

1. Discuss the intrinsic and extrinsic pathways in Apoptosis
2. Discuss radiation carcinogenesis
3. Discuss the role of Rb gene in cell cycle
4. Discuss the mechanisms of hypertrophy in cell adaption
5. Describe the various intracellular accumulations
6. Discuss the leukocyte adhesion molecules and its role in inflammation
7. Discuss the role of platelets in hemostasis
8. Describe the pathogenesis of Septic shock
9. Discuss Type 1 hypersensitivity reaction
10. Discuss the role of Leptin in Obesity

(10 marks × 10 = 100 marks)



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MANIPAL ACADEMY OF HIGHER EDUCATION
MD (PATHOLOGY) DEGREE EXAMINATION – MAY 2026
PAPER II (NEW SCHEME)

Tuesday, May 19, 2026

Time: 14:00 – 17:00 Hrs.

Max. Marks: 100

✍ **Answer ALL the questions.**

✍ **Illustrate your answers with diagrams wherever necessary.**

1. Discuss the invasive encapsulated follicular variant of papillary thyroid carcinoma and the differential diagnosis.
2. Describe the cytologic features of meningiomas and its variants.
3. Discuss the Serrated lesions of the colon and rectum.
4. Discuss the differential diagnosis of Benign breast lesions in cytology.
5. Differential diagnosis of round cell epithelial and neuroepithelial tumours of the sinonasal tract.
6. Describe the renal biopsy findings in lupus nephritis.
7. Discuss the gastric-type glandular lesions of the female genital tract.
8. Discuss the differential diagnosis of cutaneous lichenoid pattern of reaction.
9. Discuss the Gleason grading system and grade group in adenocarcinoma prostate with a note on ductal adenocarcinoma.
10. Discuss the Milan system for reporting salivary gland cytopathology.

(10 marks × 10 = 100 marks)



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MANIPAL ACADEMY OF HIGHER EDUCATION
MD (PATHOLOGY) DEGREE EXAMINATION – MAY 2026
PAPER III (NEW SCHEME)

Wednesday, May 20, 2026

Time: 14:00 – 17:00 Hrs.

Max. Marks: 100

✍ **Answer ALL the questions.**

✍ **Illustrate your answers with diagrams wherever necessary**

1. Discuss the diagnostic approach to acquired coagulation disorders. Add a note on etiopathogenesis of disseminated intravascular coagulation.
2. Discuss the antibody screening tests in blood banking.
3. Discuss the principles of automated cell counters in Hematology.
4. Classify hemolytic anemia. Add a note on pathogenesis and lab diagnosis of G6PD deficiency.
5. Discuss the guidelines for biomedical waste disposal.
6. Discuss the latest WHO classification on Myelodysplastic Syndrome and write a note on its diagnostic approach.
7. Discuss the hematological manifestations of HIV infection.
8. Discuss automated reticulocyte parameters and their clinical utility.
9. Discuss the role of stem cells in tissue homeostasis, add a note on peripheral blood stem cell harvesting.
10. Discuss cytogenetics in Acute leukemia.

(10 marks × 10 = 100 marks)



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MANIPAL ACADEMY OF HIGHER EDUCATION
MD (PATHOLOGY) DEGREE EXAMINATION – MAY 2026
PAPER IV (NEW SCHEME)

Thursday, May 21, 2026

Time: 14:00 – 17:00 Hrs.

Max. Marks: 100

✍ **Answer ALL the questions.**

✍ **Illustrate your answers with diagrams wherever necessary**

1. Discuss the Molecular classification of endometrial carcinoma.
2. Discuss the role of Liquid biopsy in diagnosis.
3. Discuss the HER2-low Breast Carcinomas.
4. Discuss the application of Computer Aided Diagnosis (CAD) in Histopathology.
5. Discuss SMARCB1 deficient tumors.
6. Discuss the Molecular Pathology and Biomarker testing in carcinoma lung.
7. Discuss the Serrated lesions of colon.
8. Discuss the new & emerging entities in the WHO classification of Renal Tumors.
9. Discuss the recent updates in the diagnosis of undifferentiated small round cell sarcoma of bone and soft tissue.
10. Discuss the role of automation in cytopathology.

(10 marks × 10 = 100 marks)

