

MANIPAL ACADEMY OF HIGHER EDUCATION**DM (GASTROENTEROLOGY) DEGREE EXAMINATION – JULY 2020****SUBJECT: PAPER I: BASIC SCIENCES AS APPLICABLE TO GASTROENTEROLOGY**

Wednesday, July 01, 2020

Time: 14:00 – 17:00 Hrs.

Max. Marks: 100

✍ **Answer ALL the questions.**

✍ **Long Essays: (answer in approximately 1500 words)**

1. Outline the physiology of calcium metabolism and its abnormalities in gastrointestinal disease.

(20 marks)

2. Describe the normal anatomy of the oesophago-gastric junction and its role in maintaining the antireflux barrier.

(20 marks)

3. **Short Essays: (Answer in 400 - 500 words)**

3A. Structure of the hepatocyte

3B. Budesonide

3C. Virulence factors of *Helicobacter pylori*

3D. Duodenal biopsies in malabsorption states

3E. Copper metabolism in health

3F. Life cycle of *Echinococcus granulosus*

(10 marks × 6 = 60 marks)



MANIPAL ACADEMY OF HIGHER EDUCATION
DM (GASTROENTEROLOGY) DEGREE EXAMINATION – JULY 2020
SUBJECT: PAPER II: GASTROENTEROLOGY AND HEPATOLOGY

Thursday, July 02, 2020

Time: 14:00 – 17:00 Hrs.

Max. Marks: 100

✍ **Answer ALL the questions.**

✍ **Long Essays: (Answer in approximately 1500 words)**

1. Classify gastric varices. Describe the management and prophylaxis of gastric variceal bleeding.

(20 marks)

2. Describe the causes diagnostic evaluation and management of diarrhea in a patient with acquired immunodeficiency syndrome.

(20 marks)

3. **Short Essays: (Answer in 400 - 500 words)**

3A. Pathogenesis of gall stone pancreatitis

3B. Palliation in oesophageal cancer

3C. Complications of endoscopic papillotomy

3D. Functional abdominal bloating

3E. Faecal incontinence

3F. Treatment of acute diverticulitis

(10 marks × 6 = 60 marks)



MANIPAL ACADEMY OF HIGHER EDUCATION
DM (GASTROENTEROLOGY) DEGREE EXAMINATION – JULY 2020
SUBJECT: PAPER III: GASTROENTEROLOGY & HEPATOLOGY

Friday, July 03, 2020

Time: 14:00 – 17:00 Hrs.

Max. Marks: 100

✍ **Answer ALL the questions.**

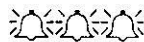
✍ **Long Essays: (Answer in approximately 1500 words):**

1. Define tropical sprue. Describe its etiology, clinical features, diagnosis and management.
(20 marks)
2. Describe the evaluation and management of recently detected Hepatitis B surface agent in a pregnant woman.
(20 marks)

3. **Short Essays: (Answer in 400 - 500 words)**

- 3A. Pneumatosis cytoides intestinal
- 3B. Abdominal pain in acquired immunodeficiency syndrome
- 3C. Hepatic granulomas
- 3D. Treatment of hepato-pulmonary syndrome
- 3E. Periapillary adenoma
- 3F. Faecal occult blood

(10 marks × 6 = 60 marks)



MANIPAL ACADEMY OF HIGHER EDUCATION
DM (GASTROENTEROLOGY) DEGREE EXAMINATION – JULY 2020
SUBJECT: PAPER IV: RECENT ADVANCES IN GASTROENTEROLOGY

Saturday, July 04, 2020

Time: 14:00- 17:00 Hrs.

Max. Marks: 100

☒ Answer ALL the questions.

☒ Long Essays: (Answer in approximately 1500 words)

1. Describe the management of upper GI bleeding in a patient with acute coronary syndrome.
(20 marks)

2. Outline the role of biologicals in the management of inflammatory bowel diseases.
(20 marks)

3. Short Essays: (Answer in 400 - 500 words)

3A. Faecal transplantation

3B. Non-celiac gluten hypersensitivity

3C. Trans-arterial radiotherapy for hepatocellular carcinoma

3D. Linaclotide

3E. Autoimmune cholangiopathy

3F. Anti-oxidant therapy in chronic pancreatitis

(10 marks × 6 = 60 marks)

