## General Medicine

- 1) Which of the following class of medicines has been linked to the occurrence of hip fractures in the elderly?
- A) Benzodiazepines
- B) Opiates
- C) Angiotensin-converting enzyme inhibitors
- D) Atypical antipsychotics

2) Patients taking which of the following drugs should avoid drinking grapefruit juice?

- A) Amoxicillin
- B) Aspirin
- C) Atorvastatin
- D) Sildenafil
- 3) Why is it necessary to co administer Vitamin B6 (Pyridoxine) with isoniazid?
- A) Vitamin B6 requirements are higher in tuberculosis.
- B) Isoniazid causes decarboxylation of gamma-carboxyl groups in Vitamin K dependent enzymes.
- C) Isoniazid interacts with pyridoxal phosphate.
- D) Isoniazid causes conversion of homocysteine to cystathionine.

4) The triad of portal vein thrombosis, hemolysis and pancytopenia suggests of the following diagnosis?

- A) Acute promyelocytic leukemia
- B) Hemolytic-uremic syndrome (HUS)
- C) Thrombotic thrombocytopenic purpura (TTP)
- D) Paroxysmal nocturnal hemoglobinuria (PNH)
- 5) The most common cause of high serum calcium in cancer is
- A) Ectopic production of parathyroid hormone
- B) Direct destruction of bone by tumor cells
- C) Local production of tumour necrosis factor and IL-6 by bony metastasis
- D) Production of parathyroid hormone-like substance

## 6) Poncet's disease refers to?

- A) Polyarthritis in disseminated tuberculosis
- B) Anterior uveitis in AIDS
- C) Posterior uveitis in disseminated tuberculosis
- D) Posterior uveitis in AIDS

7) As compared with deep-vein thrombosis in non-pregnant persons, deep-vein thrombosis in pregnant women occurs most frequently in which leg and with what risk of embolic complications?

- A) Left leg, with a greater risk
- B) Left leg, without a greater risk
- C) Right leg, with a greater risk
- D) Right leg, without a greater risk

8) Which one of the following consequences has been observed with rapid infusion or administration of large volumes of 0.9% saline?

- A) Frequent urination
- B) Hypokalemia
- C) Metabolic acidosis
- D) Renal Vasodilatation

9) Which of the following substances may interfere with gastrointestinal absorption of thyroxine?

- A) Acidophilus
- B) Echinacea
- C) Iron
- D) Vitamin D

10) Which one of the following statements is true regarding risk of relapse in minimal-change disease?

- A) Relapses are common and are more likely in patients 40 years of age or older
- B) Relapses are common and are more likely in patients younger than 40 years of age
- C) Relapses are uncommon but are more likely in patients 40 years of age or older
- D) Relapses are uncommon but are more likely in patients younger than 40 years of age

11) Percussion for splenic dullness is accomplished with following techniques except

- A) Nixon method
- B) Castell method
- C) Middleton maneuver
- D) Barkun method

12) Aplastic anemia has been associated with all of the following EXCEPT

- A) Carbamazepine
- B) Methimazole
- C) Non-steroidal inflammatory drugs
- D) Parvovirus B19 infection
- 13) Hemolytic-Uremic syndrome is characterised by all except-
- A) Acute renal failure
- B) Microangiopathic hemolytic anemia
- C) Thrombocytopenia
- D) Leukocytosis

14) Clubbing of the digits is NOT a sign of?

- A) Crohn's disease
- B) Bacterial endocarditis
- C) COPD
- D) ILD

15) Helicobacter pylori colonization is implicated in all of the following conditions EXCEPT

A) Duodenal ulcer

B) Gastric adenocarcinoma

- C) Gastric mucosa-associated lymphoid tissue (MALT) lymphoma
- D) Gastro esophageal reflux disease

16) All of the following are clinical manifestations of Ascaris lumbricoides infection EXCEPT

- A) Asymptomatic carriage
- B) Fever, headache, photophobia, nuchal rigidly and eosinophilia
- C) Nonproductive cough and pleurisy with eosinophilia
- D) Right upper quadrant pain and fever

17) Which of the following antibiotics has the weakest association with the development of Clostridium difficile-associated disease?

- A) Ceftriaxone
- B) Ciprofloxacin
- C) Clindmycin
- D) Piperacillin-tazobactum

- 18) Which one of the following choices is one of the major risk factors for invasive candidiasis?
- A) Acute necrotizing pancreatitis
- B) Central venous catheters
- C) Hematologic malignant disease
- D) Hemodialysis

19) Which one of the following drug classes is the mainstay of pharmacologic treatment of eosinophilic esophagitis?

- A) Antihistamines
- B) Leukotriene modifiers
- C) Mast-cell stabilizers
- D) Topical glucocorticoids

20) Which of the following statements is TRUE regarding the clinical manifestations of IgG4-related disease?

- A) Constitutional symptoms are present in most cases.
- B) Mass lesions are uncommon.
- C) Muscle involvement has generally not been reported.
- D) Retroperitoneal involvement occurs in 40% of affected patients.

21) For diagnosis of coronary microvascular dysfunction, coronary flow reserve should be:

- A) >5
- B) >3.5

C) <2.5

- D) <1.2
- 22) Beta blockers do not:
- A) Decrease adrenergic drive
- B) Decrease QTc
- C) Increase QT dispersion
- D) Improve LV filling dynamics
- 23) Classification criteria for metabolic syndrome includes all EXCEPT
- A) Dysglycemia (Fasting Blood Glucose >200mg/dL)
- B) High cholesterol (serum total cholesterol >200mg/dL)
- C) High Triglycerides (serum TG>150)
- D) Low HDL (<40 in males and <50 in females)
- 24) On MRI "Pituitary Bright Spot" is due to-
- A) Pituitary stalk
- B) Posterior pituitary
- C) Anterior pituitary
- D) None of the above

25) Which of the following congenital heart defects causes fixed splitting of the second heart sound?

- A) Atrial septal defect
- B) Epstein's anomaly
- C) Patent foramen ovale
- D) All above

26) All the following drugs can cause eosinophilic pneumonia EXCEPT

- A) Nitrofurantoin
- B) Sulfonamides
- C) Nonsteroidal anti-inflammatory drugs (NSAIDs)
- D) Amiodarone

27) Which one of the following choices is a new prokinetic agent for functional dyspepsia being evaluated in phase 3 trials in western countries?

- A) Acotiamide
- B) Cisapride
- C) Itopride
- D) Zacopride

28) Which drug acts on late sodium current?

- A) Ranolazine
- B) Ivabradin
- C) Doxazosin
- D) Mebifradil
- 29) Lorcaserin is a:
- A) Serotonin/noradrenalin reuptake inhibitor
- B) Serotonin 2C receptor agonist
- C) CB1 receptor antagonist
- D) Gastric and pancreatic lipase inhibitor
- 30) Hyperuricemia is an independent risk factor for:
- A) Systemic hypertension
- B) Diabetes mellitus
- C) Dyslipidemia
- D) Atherosclerosis
- 31) Nephrogenic Diabetes insipidus is treated by?
- A) Amiloride
- B) Thiazide diuretic
- C) Indomethacin
- D) All of the above

32) All the following are pulmonary manifestations of systemic lupus erythematosus (SLE) EXCEPT:

- A) Pleuritis
- B) Progressive pulmonary fibrosis
- C) Pulmonary haemorrhage
- D) Diaphragmatic dysfunction with loss of lung volumes

33) From which stage of sleep are the parasomnias somnambulism and night terrors most likely to occur?

- A) Stage 1
- B) Stage 2
- C) Stage 3 / 4 (slow-wave sleep)
- D) Rapid-eye-movement (REM) sleep
- 34) Which of the following interstitial lung disease is not associated with smoking?
- A) Desquamative interstitial pneumonitis
- B) Respiratory bronchiolitis-interstitial disease
- C) Pulmonary Langerhans cell histiocytosis
- D) Bronchiolitis obliterans organizing pneumonia

35) Which one of the following choices represents one of the cancers that have most commonly been associated with membranous nephropathy?

- A) Liver cancer
- B) Pancreatic cancer
- C) Prostate cancer
- D) Thyroid cancer

36) Carbapenam group of antibiotics are ineffective in -

- A) Extended spectrum beta lactamase (ESBL)
- B) NDM1 producing bacteria
- C) Klebsiella pneumonia
- D) Acinetobacter

37) Which one of the following statements about the treatment of tuberculosis is true?

A) In addition to drug-resistance mutations, multiple Mycobacterium tuberculosis genetic factors appear to influence treatment outcomes.

B) Studies have shown limited penetration by rifampin into caseous foci.

- C) The 6-month standard course of therapy for drug-susceptible disease is longer than necessary for some patients.
- D) At least three M. tuberculosis subpopulations with different intrinsic drug susceptibilities are thought to exist.

38) Which one of the following agents is generally recommended for the treatment of venous thromboembolism during pregnancy?

- A) Dabigatran
- B) Low-molecular-weight heparin
- C) Unfractionated heparin
- D) Warfarin

39) Which of the following in not true regarding parathyroid hormone (PTH) and Vitamin D?

- A) Vitamin D deficiency causes hyperparathyroidism
- B) PTH is needed for 1-hyroxylation in the liver
- C) Magnesium is needed for PTH secretion
- D) PTH is needed for 1-hydroxylation in the kidneys

40) All of the following are examples of advanced glycation end products EXCEPT:

- A) HbA1c
- B) Glycated albumin
- C) Fructosamine
- D) Salivary glycosylation

41) Which of the following is considered as fourth component of glycemic control?

- A) Glycemic variability
- B) HbA1c
- C) Glycated albumin
- D) Post-prandial plasma glucose
- 42) Which drug should be avoided in heart failure?
- A) Saxagliptin
- B) Pioglitazone
- C) Metformin
- D) All of the above

43) Significant allergic reactions like angioedema, anaphylaxis and Stevens-Johnson syndrome are seen with:

- A) Sitagliptin
- B) Vildagliptin
- C) Saxagliptin
- D) Linagliptin

44) Subclinical hypothyroidism is defined as elevated TSH with:

- A) Normal T4
- B) Low T4
- C) Low FT4
- D) Normal FT4

45) Which of the following statements about alcoholic liver disease is not true?

- A) Alcoholic cirrhosis is often characterized by diffuse fine scarring with small regenerative nodules
- B) Ratio of AST to ALT is often higher than 2
- C) Serum aspartate aminotransferase levels are often greater than 1000U/L
- D) Concomitant hepatitis C accelerates the development of alcoholic cirrhosis

46) All the following are potential side effects of Infliximab except:

- A) Demyelinating disorders
- B) Exacerbation of heart failure
- C) Pancytopenia
- D) Pulmonary fibrosis

47) What is the most common extra-articular manifestation of ankylosing spondylitis?

- A) Anterior uveitis
- B) Cataracts
- C) Inflammatory bowel disease
- D) Third-degree heart block

48) All the following organisms have been implicated in reactive arthritis except

- A) Chlamydia trachomatis
- B) Niesseria gonorrheae
- C) Salmonella enteritidis
- D) Shigela dysenteriae

49) Which one of the following clinical findings suggests an increased risk that a thyroid nodule is malignant?

- A) Family history of auto-immune thyroiditis
- B) Family history of multiple endocrine neoplasia type 1.
- C) Female sex
- D) Focal uptake of <sup>18</sup> F- fluorodeoxyglucose by the thyroid
- 50) Which one of the following statements accurately describes ibrutinib?
- A) It is an inhibitor of Bruton's tyrosine kinase
- B) It is an interleukin-2 receptor agonist
- C) It is a monoclonal antibody directed against CD20
- D) It is a phosphoinositide3-kinase inhibitor
- 51) Which one of the following statements best describes Selexipag?
- A) It is a guanylate cyclase stimulator
- B) It is a phosphodiesterase type 5 inhibitor
- C) It is an IP prostacyclin-receptor agonist
- D) It is an endothelin-receptor antagonist

- 52) Indications for treating subclinical hyperthyroidism are all except
- A) Age > 65 years
- B) Presence of heart disease
- C) Post menopausal women
- D) Symptomatic patient
- 53) SIADH is diagnosed by:
- A) Schwartz criteria
- B) Serum vasopressin levels
- C) Water loading tests
- D) All of the above

54) Distinct complication of hepatic hydrothorax is

- A) Hepatic encephalopathy
- B) ARDS
- C) Hydro-pneumothorax
- D) Spontaneous bacterial empyema

55) What total kidney volume is a risk factor for rapid deterioration of GFR in ADPKD?

- A) 750 ml
- B) 2000 ml
- C) 1500 ml
- D) 500 ml

56) A patient with Systemic Lupus Erythematosus (SLE) has impaired kidney function. Which class is unlikely in renal histology?

- A) Class IV
- B) Class III
- C) Class II
- D) Class V

57) All the following drugs are associated with an increased risk of osteoporosis in adults except

- A) Cyclosporine
- B) Dilantin
- C) Heparin
- D) Ranitidine

58) All the following are effects of hypercalcemia except

- A) Diarrhea
- B) Confusion
- C) Polyuria
- D) Short QT interval

59) All of the following would be expected to increase serum prolactin levels except

- A) Chest wall trauma
- B) Hyperthyroidism
- C) Renal failure
- D) Sexual orgasm

60) Which one of the following statements about the clinical manifestations of narcolepsy is true?

- A) Affected patient tend to have low body-mass index (BMI)
- B) Complex auditory hallucinations are common
- C) Rapid-eye-movement (REM) sleep can occur at any time of day
- D) Symptoms usually begin in midlife

- 61) In IgA nephropathy, deposition of IgA occurs in -
- A) Glomerular capillaries
- B) Glomerular mesangium
- C) Glomerular basement membrane
- D) All of these

62) Which one of the following statements describes the ability of rifampin and levofloxacin to cross the blood-brain barrier?

- A) CSF concentrations of both drugs are < 30% of the plasma concentrations.
- B) CSF concentrations of both drugs reach 70% of the plasma concentrations.

C) CSF concentration of Levofloxacin reach 70% of the plasma concentration; those of rifampin reach < 30% of plasma concentration.

D) CSF concentration of rifampin reach 70% of the plasma concentration; those of Levofloxacin reach < 30% of plasma concentration.

63) Which one of the following statements about pharmacologic therapies for postmenopausal osteoporosis is true?

- A) Denosumab cannot be used in compromised renal function.
- B) Teriparatide works primarily by decreasing bone resorption.
- C) Use of bisphosphonates should be limited to those who have normal serum Vitamin D levels.
- D) Zoledronic acid causes flulike symptoms for up to 3 days after the first infusion in up to two thirds of patients.

64) High dietary intake of sodium leads to

- A) Increased risk of calcium stone formation
- B) Decreased risk of calcium stone formation
- C) Has no effect on stone formation
- D) None of the above

65) According to the current recommendations. metformin can be used in type 2 DM with CKD till e-GFR of:

- A) 30 ml/min
- B) 40 ml/min
- C) 50 ml/min
- D) 60 ml/min

66) Which is the safest sulfonylurea in chronic kidney disease?

- A) Glibenclimide
- B) Gliclazide
- C) Glimepride
- D) Glipizide

67) Which of the following therapies have been shown to retard deterioration of lung functions in COPD?

- A) Salmeterol
- B) Tiotropium
- C) Inhaled steroids
- D) None of the above

68) The indication of starting inhaled corticosteroids in COPD is:

- A) FEV1 < 30%
- B) FEV1 < 60%
- C) More than 2 exacerbations per year
- D) More than 4 exacerbations per year

- 69) What is true about angiotensin converting enzyme (ACE) levels in sarcoidosis:
- A) Elevated ACE levels predict worse outcomes
- B) ACE is a sensitive biomarker for diagnosis of sarcoidosis
- C) ACE is a specific biomarker for diagnosis of sarcoidosis
- D) ACE activity may predict disease activity in selected cases
- 70) The earliest site to be involved in Alzheimer's disease is:
- A) Perihippocampal region
- B) Frontal lobe

C) Temporo-parietal region

- D) Anterior thalamic nucleus
- 71) Which of the following statements about Syringomyelia is true?
- A) > 50% cases associated with Chiari malformations
- B) Symptoms typically begin in middle life
- C) Syrinx cavities are always congenital
- D) Vibration & position sense are usually diminished

72) Which drug can be used safely during pregnancy for treatment of chronic hepatitis-B infection -

- A) Telbivudine
- B) Tenofovir
- C) Entecavir
- D) Both A & B

73) Which one of the following statements about the management of functional dyspepsia is true?

- A) Antacids are modestly effective in reducing symptoms
- B) Psychological therapies have an established role in treatment.
- C) The benefit of helicobacter pylori eradication therapy may be greatest for patients with postprandial fullness.
- D) Tricyclic antidepressants such as amitriptyline are preferred over selective serotonin-reuptake inhibitors for treatment.

74) Which one of the following statements is true about the treatment of drug-resistant tuberculosis?

- A) Regimens for MDR disease are substantially more toxic than standard regimens
- B) Rifampin resistance in the absence of isoniazid resistance is not uncommon
- C) Appropriate duration of treatment for MDR tuberculosis is 20 months
- D) WHO recommends an induction phase lasting 4 months for MDR disease

75) Which one of the following statements is true regarding Vasculitis?

- A) Associated cardiac disease is typically limited to disorders that affect the small vessels.
- B) Cutaneous involvement is generally seen with disorders that affect the large vessels.
- C) Skin findings include palpable purpura that may ulcerate.
- D) Tests for ANA & ANCA are rarely positive.

76) Primary antiepileptic drug which should be avoided in patients with pre-existing cardiac disease is:

- A) Phenytoin sodium
- B) Sodium valproate
- C) Carbamazepine
- D) Phenobarbitone

77) Drug of choice to treat early alcohol- related seizure in ICU is:

- A) Midazolam
- B) Diazepam
- C) Phenytoin sodium
- D) Lorazepam

- 78) All of the following are CNS manifestations of SLE except:
- A) Myasthenis gravis
- B) Demyelinating syndrome
- C) Aseptic meningitis
- D) Myelopathy syndrome

79) Which of the following are the dermatological manifestations of primary Sjogren's syndrome?

- A) Dryness of skin
- B) Alopecia
- C) Annular erythema
- D) All the above

80) Which is the most common invasive fungal disease in lung transplant recipient?

- A) Aspergillosis
- B) Candidiasis
- C) Pneumocystis jiroveci
- D) Mucormycosis

81) Which of the following neurologic phenomena is classically associated with herniation of the brain through the foramen magnum?

- A) Third nerve compression and ipsilateral papillary dilatation
- B) Catatonia
- C) "Locked in" state
- D) Respiratory arrest
- 82) All of the following are side effects of phenytoin except
- A) Leucopenia
- B) Ataxia
- C) Osteomalacia
- D) Facial coarsening

83) Which of the following medicines has been most commonly implicated in development of noninfectious chronic meningitis?

- A) Acetaminophen
- B) Ibuprofen
- C) Beta-lactam antibiotics
- D) Phenobarbitone

84) All of the following match the anticoagulant with its correct mechanism of action except

- A) Abciximab GpIIb/IIIa receptor inhibition
- B) Clopidogrel inhibition of thromboxane A2 release
- C) Fondaparinux inhibition of factor Xa
- D) Argatroban thrombin inhibition

85) All the following types of cancer commonly metastasize to the central nervous system except

- A) Ovarian
- B) Breast
- C) Melanoma
- D) Hypernephroma

- 86) The cushing response is?
- A) Slowing of respiration
- B) Decrease of pulse rate
- C) Increase in arterial blood pressure
- D) Decrease of blood pressure

87) A 36 year old man with HIV (Cd4+ count 112) develops a scaly, waxy, yellowish, patchy, crusty, pruritic rash on and around his nose. Rest of his skin examination is normal. What is the likely diagnosis?

- A) Molluscum contagiosum
- B) Psoriasis
- C) Reactivation herpes zoster
- D) Seborrheic dermatitis

88) Which one of the following podocyte receptors is targeted by an autoantibody associated with primary membranous nephropathy?

- A) DDR 1
- B) IGF 1R
- C) PLA 2R
- D) PDGFR

89) A 40 year patient presented with ABG values – Na<sup>+</sup> 140, K<sup>+</sup> 4.0, Cl<sup>-</sup> 106, HCO<sub>3</sub><sup>-</sup> 14, AG 20, PaCO<sub>2</sub> 24, pH 7.39, the diagnosis is –

- A) Metabolic acidosis, respiratory acidosis
- B) Metabolic acidosis, respiratory alkalosis
- C) Metabolic alkalosis, respiratory alkalosis
- D) Metabolic alkalosis, respiratory acidosis

90) All of the following factors increase the risk for Clostridium difficile-associated disease except

- A) Antacids
- B) C. difficile colonization
- C) Enteral tube feeds
- D) Older age

91) All of the following clinical findings are consistent with severe mitral stenosis except

- A) Atrial fibrillation
- B) Opening snap late after S2
- C) Pulsatile liver
- D) Right ventricular heave

92) Acute hyperkalemia is associated with which of the following ECG changes?

- A) QRS widening
- B) Prolongation of ST segment
- C) Decrease in PR interval
- D) T wave flattening

93) Which of the following organisms is unlikely to be found in the sputum of a patient with cystic fibrosis?

- A) Haemophilus influenzae
- B) Aspergillus fumigates
- C) Staphylococcus aureus
- D) Acinetobacter baumannii

94) A 20 year-old normal non-smoking female has pulmonary embolism while on oral contraceptive pills. Which of the following is the most likely predisposing factor?

- A) Abnormal factor V
- B) Abnormal protein C
- C) Reduced protein C level
- D) Reduced protein S level

95) Which of the following is the most potent stimulus for hypothalamic production of arginine vasopressin?

- A) Hypertonicity
- B) Hyperkalemia
- C) Hypotonicity
- D) Intravascular volume depletion

96) In patients with chronic renal failure, which of the following is the most important contributor to renal osteodystrophy?

- A) Impaired renal production of 1,25-dihydroxy Vitamin D3
- B) Hypocalcaemia
- C) Hypophosphatemia
- D) Loss of Vitamin D and calcium via dialysis
- 97) True about intra-hepatic cholestasis of pregnancy:
- A) Presents with jaundice in first trimester of pregnancy
- B) Treatment of choice is delivery of fetus
- C) Associated with maternal mortality rate of upto 20%
- D) Bile acid levels are elevated upto 10-25 fold

98) Febrile neutropenia is defined as

- A) Fever > 100 F, ANC < 500
- B) Fever > 100 F, ANC > 500
- C) Fever > 101 F, ANC < 500
- D) Fever >101 F, ANC > 500

99) Most common type of HIV-1 clade in India is:

- A) Clade A
- B) Clade B
- C) Clade C
- D) Clade D

100) Consensus expert opinion supports the use of which one of the following agents for pharmacologic treatment of anxiety at end of life?

- A) Atypical antipsychotics
- B) Benzodiazepines
- C) Selective serotonin-reuptake inhibitors
- D) Tricyclic antidepressants