

20. A doctor gives his patient a cephalosporin that has excellent activity against gram negative microorganisms and very little activity against gram positive microorganisms. Which of the following cephalosporins was the patient most likely given?

- a) Cefazolin
- b) Ceftriaxone
- c) Cephalexin
- d) Cefepime

21. Which of the following is the reason for adding drugs like clavulanic acid to some penicillins.

- a) To inhibit bacterial inactivation of penicillins
- b) To decrease allergenicity of penicillins
- c) To inhibit renal secretion of penicillins
- d) To increase entry of penicillins into the bacteria

22. A junior house officer prescribes an antibiotic for a patient of typhoid fever. A senior doctor tells him that this drug is rarely used nowadays because it causes aplastic anemia. Which one of the following drugs was this patient most likely prescribed?

- a) Amoxicillin
- b) Cefotaxime
- c) Ciprofloxacin.
- d) Chloramphenicol

23. A patient has been diagnosed with infection caused by Mycobacterium avium intracellular. Which one of the following drugs will you most likely prescribe him?

- a) Clarithromycin
- b) Erythromycin
- c) Tetracycline
- d) Cefotaxime

24. Which of the following is the drug of choice for treatment of pseudomembranous colitis caused by clostridium difficile that does not respond to metronidazole?

- a) Ampicillin
- b) Vancomycin
- c) Clindamycin
- d) Tetracycline

25. A patient is taking a loop diuretic for a certain cardiovascular disease. Which of the drugs will most likely be avoided for him due to fear of increased ototoxicity?

- a) Gentamicin
- b) Tetracycline
- c) Amoxicillin
- d) Ciprofloxacin

26. An 8 years old boy is brought to you with complaint of brownish yellow and deformed anterior tooth after he received an antibiotic. Which of the following did he most likely receive?

- a) Tetracycline
- b) Gentamicin
- c) Erythromycin
- d) Cotrimoxazole

27. A patient is receiving a sulfonamide for an infection but due to little clinical response, another (antibiotic antifolate drug) is given in combination. Which of the following is the primary reason for this combination?

- a. Decrease development of resistance
- b. Increase toxicity against the microbe
- c. Decrease toxicity to patients
- d. To produce a synergistic effect

28. A 30 year-old male has had a heart transplant and is being maintained on the immunosuppressant cyclosporine. He develops a Candida infection and is treated with ketoconazole. Why is this poor therapy?

- A. Ketoconazole is not effective against Candida species.
- B. Ketoconazole reacts with cyclosporine to inactivate it.
- C. Ketoconazole has a potential for cardiotoxicity.
- D. Ketoconazole inhibits cytochrome P450 enzymes that inactivate cyclosporine.

29. Which of the following antifungal drugs are used topically in dermatophytic infections (ringworm infections)?

- a. Clotrimazole.
- b. Miconazole
- c. clofazimine.
- D. Both a and b

30. A 40 years old man with AIDS develops cryptococcal meningitis. He refuses intravenous therapy. Which of the following is the best choice of oral therapy for this patient?

- a) Fluconazole
- b. Griseofulvin
- c. Nystatin
- d. Ketoconazole

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11. An 8 years old boy has a significant bed wetting problem. Which of the following drugs is an antidepressant with antimuscarinic actions and most likely used for the treatment of this disorder?

- a) Imipramine
- b) Fluoxetine
- c) Venlafaxine
- d) Phenelzine

12. A depressed patient taking antidepressant medication goes to McDonald's to lighten up his mood. He has an excess intake of cheese. Shortly afterwards he ends up in the emergency room with abnormally elevated blood pressure. Which one of the following medications was most likely responsible for his conditions?

- a) Bupropion
- b) Fluoxetine
- c) Imipramine
- d) Phenelzine (MAO inhibitor)

13. Your psychiatric patient visits you for a checkup. As he moves his hands, you notice a slight tremor. He tells you that since he has been on medications he is always thirsty and frequently has to urinate. The drug he is most likely to be taking is:

- a) Carbamazepine
- b) Clozapine
- c) Valproic acid
- d) Lithium

14. Which of the following is the most likely electrophysiological consequence of the activation of postsynaptic μ opioid receptors on the pain transmission neurons in the spinal cord?

- a) Decrease in membrane K^+ conductance
- b) Increase in membrane Na^+ conductance
- c) Production of an excitatory postsynaptic potential
- d) Production of an inhibitory postsynaptic potential

15. A patient sustains severe head injury in a motor vehicle accident. The doctor avoids an opioid analgesic for this patient most likely because:

- a) It may cause development of addiction in patient
- b) It may cause constipation
- c) It may raise the intracranial pressure
- d) Opioids are not effective for head injuries

16. Which of the following is the most likely reason why broadspectrum antibiotics cause superinfections?

- a) Due to development of resistance
- b) Masking disease symptoms
- c) Impairment of normal microflora of the host
- d) Impairment of normal inflammatory reaction

17. A patient develops resistance to an antibiotic. Which one of the following is the least likely reason for this?

- a) Decreased penetration of the drug to its site of action
- b) Increased efflux of the drug from its site of action
- c) The drug has to bind to a different site to exert its full effect
- d) Chemical/structural change in target site of the drug

18. Which of the following is incorrectly matched with its mechanism of action:

- a) Penicillin: Inhibition of autolytic enzymes in bacterial cell wall
- b) Vancomycin: Inhibition of transglycosylase in bacterial cell wall
- c) Bacitracin: Inhibits transfer of peptidoglycan subunits to the growing cell wall
- d) Fosfomycin: Inhibits 1st step in the synthesis of N acetylmuramic acid

19. A patient comes to you with complaint of acute pharyngitis/ acute tonsillitis due to group A beta hemolytic streptococci. Which of the following drugs would you most likely prescribe him?

- a) Amikacin
- b) Doxycycline
- c) Benzathine penicillin
- d) Vancomycin

DEPARTMENT OF PHARMACOLOGY
3rd year MBBS
(MCQ's CNS and Chemo)

Time Allowed: 30 mins

Max Marks:30

1. An 18 years old college boy was taking morphine for the last 1 year. He now presents in emergency department with complaints of drowsiness, disorientation, cyanosis, pupils are constricted, yellow clammy skin and shallow breathing. His BP is 90/60mmHg. Which one of the following drugs is given to overcome the effects of morphine:
- a) Flumazenil b) Buspirone c) Naloxone d) Ketamine
2. A 51 years old patient with parkinsonism is being maintained on levodopa-carbidopa with adjunctive use of low doses of entacapone but continues to have off periods of akinesia. The most appropriate drug to rescue the patient but that will only provide temporary relief is:
- a) Apomorphine b. Carbidopa c. Ropinirole d. Selegiline
3. All of the following muscle relaxant are correctly matched except:
- a. Baclofen: GABA mimetic d. Botulinum toxin: Decrease release of acetylcholine
 b) Diazepam: GABA inhibitory
c. Tizanidine : α_2 agonist
4. A patient is having severe muscle spasms. He is given a spasmolytic that is also used in the management of seizures caused by overdose of a local anesthetic. Which of the following drugs is it most likely?
- a) Baclofen c) Dantrolene
b) Cyclobenzaprine d) Diazepam
5. A 64 years old patient of Parkinson's disease on medication is brought to the dermatologist Complaining of purplish skin with spotted appearance. Which one of the following drugs is most likely responsible for these symptoms?
- a) Amantadine c) Selegiline
b) Levodopa d) Entacapone
6. Which of the following drugs would you most likely give to a patient with choreoathetosis with decreased mental ability and psychosis, suggestive of Huntington's disease?
- a) Amantadine c) Tetrabenazine
b) Levodopa d) Bromocriptine
7. A 31 years old man is diagnosed with schizophrenia. He is treated with a neuroleptic drug and now he becomes rigid confused and develops fever of 105 F. Therapy with neuroleptic is stopped and supportive measures are taken. Which of the following drugs should also be given?
- a) Amoxapine c) Fluoxetine
 b) Dantrolene d) Lithium
8. The reason why clozapine causes less extrapyramidal dysfunction than haloperidol is that clozapine
- a) Activates GABA receptors d) Has greater antagonism at muscarinic receptors
b) Blocks dopamine release
 c) Has a low affinity for dopamine D2 receptors
9. An adolescent male is newly diagnosed with schizophrenia. Which of the following neuroleptic agent will most likely improve his apathy and blunted affect?
- a) Chlorpromazine c) Risperidone
b) Haloperidol d) Thioridazine
10. Which of the following is preferred for treatment of anorexia nervosa or bulimia nervosa in which there is binge eating followed by vomiting and purging episodes?
- a) Amitriptyline c) Fluoxetine (SSRI)
b) Bupropion d) Trazodone

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(20/9) -

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