

- 1) The tuberculosis is a disease difficult to treat. Why?
  - a. **Mycobacterium tuberculosis has resistance to several antibiotics and survives under extreme conditions such strong acidity or alkalinity, low oxygen situation.**
  - b. Mycobacterium tuberculosis is a gram-positive bacillus
  - c. Mycobacterium tuberculosis is a gram –negative bacillus
  - d. Mycobacterium tuberculosis is a spore forming, non motile, obligate-aerobic intracellular bacterium
  
- 2) What's the globally incidence of TB disease?
  - a. **About 0.15%**
  - b. It is not known
  - c. About 2%
  - d. 15 million people fell ill with TB in 2017
  
- 3) A: First line are more effective than second line medications  
B: Second line medications are less toxic than the first line medications.
  - a. **A: true B: false**
  - b. A: false B: false
  - c. A: false B: true
  - d. A: true B: true
  
- 4) Some people are known to have a higher risk of becoming ill with TB. Who?
  - a. **People with a compromised immune system**
  - b. People who consume a large amount of alcohol
  - c. People who consume a large amount of food
  - d. All adult people (18-65 years old)
  
- 5) What does MDR-TB mean?
  - a. It means multidrug-resistant TB (resistance to isoniazid and ethambutol)
  - b. **It means multidrug-resistant TB (resistance to isoniazid and rifampin)**
  - c. It means multidose-resistant TB (resistance to isoniazid and ethambutol)
  - d. It means multidrug- reactive resistance TB (resistance to isoniazid and ethambutol)
  
- 6) Which is the most hepatotoxic drug?
  - a. rifampin,
  - b. **pyrazinamide**

- c. ethambutol
- d. isoniazide

7) What's the effect of this interaction: concurrent use of nevirapine and rifampin

- a. **It may result in nevirapine decreased serum concentration and possible loss of its efficacy**
- b. It may result in nevirapine increased serum concentration
- c. No effects
- d. It may result in rifampin decreased serum concentration

8) In which situations the risk of QTc prolongation may be higher in people taking delamanid?

- a. Risk of QTc prolongation may be higher in persons with hyperuricemia
- b. Risk of QTc prolongation may be higher in persons with arthralgia
- c. Risk of QTc prolongation may be higher in persons with hemoptysis
- d. **Risk of QTc prolongation may be higher in persons with low albumin**

9) A: Ototoxicity is more common with amikacin than kanamycin

B: All of the injectable agents have potential for renal toxicity

- a. A: true B: false
- b. A: false B: false
- c. A: false B: true
- d. **A: true B: true**

10) What's the half life of bedaquiline?

- a. 4 months
- b. It is unknown
- c. 4 weeks
- d. **5.5 months**