

# Anesthesia Final Exam

- 1) For a patient who is chronically taking the following medications, which **two** should be withheld on the day of surgery?
  - a) Lasix
  - b) Metoprolol
  - c) Glucophage
  - d) Theodur
- 2) A 51 year old poorly controlled insulin dependent diabetic who is obese (320 lbs.) and is having a debridement of a diabetic foot ulcer would be given which of the following ASA Physical Status Classification?
  - a) I
  - b) 2
  - c) 3
  - d) 4
  - e) 4E
- 3) Which of the following characteristics correlate with the potential for a difficult intubation?
  - a) Mallampati class 3
  - b) Thyromental distance less than 6 cm
  - c) Poor extension of neck
  - d) Receding mandible
  - e) Protruding incisors, short neck
  - f) All of the above
- 4) If you are having difficulty in ventilating a patient and a foreign body has been ruled out which of the following maneuvers may assist you in mask ventilation?
  - a) Head tilt jaw lift
  - b) Oral airway
  - c) Nasopharyngeal airway
  - d) LMA
  - e) Call for help
  - f) All of the above
- 5) What is the correct size tube to place in a normal 4 year old?
  - a) 6.5 cuffed
  - b) 3.5 cuffed
  - c) 5.0 uncuffed
  - d) 8.0 uncuffed
- 6) Where should a 6.0 endotracheal tube be taped?
  - a) 19cm at the lips
  - b) 13cm at the lips
  - c) 16cm at the lips
  - d) 18cm at the lips with confirmation by auscultation

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- 7) What disease states will cause an increase in SvO<sub>2</sub>?
- Sepsis
  - Cirrhosis
  - Hypothermia
  - SNP toxicity
  - All of the above
- 8) Which is the best indicator of ischemia?
- ST segment changes
  - Regional wall motion abnormalities
  - Increase filling pressures
  - Decreased EF%
  - None of the above
- 9) On which post-operative day is the highest incidence of myocardial infarction?
- one
  - six
  - three
  - four
  - seven
- 10) What is the definition cardiac output (CO)?
- $CO = (BP) (HR)$
  - $CO = (HR) (SVR)$
  - $CO(BP)(SVR)$
  - $CO=(HR)(SV)$
  - $CO=(BP)(SV)$
- 11) What is the Definition of Stroke Volume?
- LVEDP—LVEDV
  - LVESV—LVEDV
  - LVEDV—LVESV
  - LVESV—LVEDV
  - None of the above
- 12) The LMA (Laryngeal mask airway) is contraindicated in all of the following except?
- Pregnancy
  - Bronchospasm
  - Obesity
  - Diabetes
  - Recent Trauma
- 13) **True or False.** (circle one) The curved laryngoscope blade (Macintosh) is designed to compress the epiglottis, lifting it anteriorly to visualize the larynx.
- 14) **True or False.** (circle one) The hinged connection of a folding laryngoscope is specifically designed to act as a lever and the maxilla as a fulcrum to facilitate intubation.
- 15) **True or False.** (circle one) The “sniffing” position results in flexion of the atlanto occipital joints and extension of the cervical spine.

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- 16) The short duration of effect, seen with induction agents such as Thiopental and Propofol is due to which of the following?
- a) The rapid metabolism by the plasma cholinesterase.
  - b) The rapid elimination by the kidneys
  - c) The short Alpha half life due to redistribution.
  - d) Evaporation from high minute ventilation.
- 17) Which induction agent is most appropriate in an individual with a poor ejection fraction NYHA III going for an emergency laparoscopic cholecystectomy?
- a) Propofol
  - b) Etomidate
  - c) Thiopental
  - d) Ketamine
  - e) Methohexital
- 18) Which of the following reduces the cerebral blood flow and cerebral metabolic rate the most and should be considered when inducing a patient with increased intracerebral pressure?
- a) Halothane
  - b) Etomidate
  - c) Thiopental
  - d) Ketamine
- 19) **True** or **False**. (circle one) A pregnant woman is rarely considered a full stomach due to their increased caloric requirements.
- 20) Which is the first maneuver performed when a supine parturient suddenly becomes nauseated?
- a) Give 10mg of metoclopramide,iv
  - b) Place in trendelenburg and give Odonstarone 4mg iv
  - c) Position in left uterine displacement and check a blood pressure
  - d) Order 100mg of rectal Tigan and place an oral gastric tube.
- 21) The anesthetic requirements are greatly (Increased, Decreased) in a pregnant patient. (circle one)
- 22) Which nerve roots need to be blocked to produce analgesia during the 1st stage labor?
- a) T2—S1
  - b) T10-L1
  - c) S2—S4
  - d) T10—S4
- 23) At what site do local anesthetics work?
- a) Na + Channels located on the inside of the lipid nerve membrane.
  - b) At the muscuranic acetylcholine receptors located at the neuromuscular junction.
  - c) K+ Channels located at the nerve end plate.
  - d) No specific site but its mechanism relies on temporary neural toxicity.
- 24) How many (mg) are ther in 20cc of ¼% Marcaine?
- a) 5mg of Xylocaine
  - b) 50mg of Bupivacaine
  - c) 50mg of Procaine
  - d) 250 mg of Marcaine

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- 25) What is the toxic dose of Bupivacaine per kilogram?
- a) 1
  - b) 2
  - c) 30
  - d) 3
  - e) 7
- 26) What is a contraindication for a spinal anesthetic?
- a) Patient refusal
  - b) Infection at the site of needle insertion
  - c) Severe aortic stenosis
  - d) Coagulopathy
  - e) All of the above
- 27) An Infants cardiac output is most dependent on which of the following?
- a) Stroke Volume
  - b) Heart rate
  - c) SVR
  - d) Contractility
- 28) The maintenance rate for IV fluids in a 3 year old boy weighing 24kg is which of the following?
- a) 24cc/hr
  - b) 51cc/hr
  - c) 64cc/hr
  - d) 48cc/hr
- 29) Children will desaturate at a faster rate than adults primarily due to which of the following?
- a) Smaller lung mass
  - b) Greater Oxygen consumption in relation to body mass
  - c) Faster Respiratory rate
  - d) Smaller FRC
- 30) The standards of care for a General Anesthetic include which of the following?
- a) Monitoring of oxygenation
  - b) Monitoring of ventilation
  - c) Monitoring of circulation
  - d) Monitoring of temperature
  - e) All of the above
- 31) Which of the following is the most important factor in determining proper placement of your endotracheal tube?
- a) Pulse oximetry
  - b) End tidal CO<sub>2</sub>
  - c) Peak inspiratory pressure
  - d) Tidal volume and Rate set on the ventilator
  - e) Auscultation

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- 32) Pulse oximetry may be interfered by which of the following?
- a) Fluorescent lights
  - b) Cold appendage
  - c) Movement
  - d) Carbon monoxide poisoning
  - e) All of the above
- 33) Halothane and Sevoflurane are both used for mask inductions in children due to which of the following?
- a) Least pungent to inhale
  - b) Least cardiotoxic
  - c) Greatest analgesic effect
  - d) Earlier emergence
- 34) **True** or **False**. (circle one) MAC represents the Minimal Alveolar Concentration of an inhaled anesthetic which inhibits skeletal movement in response to a noxious stimulus in 50% of patients.
- 35) What is the principle property that effects the speed of induction and emergence of an inhalation agent?
- a) Blood Gas Solubility Coefficient
  - b) Molecular weight
  - c) Baricity
  - d) Vapor pressure