

The following reports describe concepts from the In-Training Examination that were most misunderstood by examinees or proved to be especially difficult. Each question was reviewed by the ITE Committee as part of key validation and the correct answer was determined to be accurate. The reports are arranged by year.

## 2024 GAPS IN KNOWLEDGE REPORT

- In infants the anteromedial proximal tibia is the preferred site for an intraosseous cannula placement.
- Amiodarone potentiates the effect of direct oral anticoagulants.
- Urinary symptoms are common findings in chronic adhesive arachnoiditis.
- For procedures under deep sedation, aspiration is less common than complications from the procedures themselves.
- Black children are more likely to suffer respiratory compromise than White children.
- The chloride channel is abnormal in patients with myotonia congenita.
- Cystatin C is an accurate biomarker of renal function.
- The terminal half-life is the smallest exponent on a semilogarithmic graph.

## **2023 GAPS IN KNOWLEDGE REPORT**

- Using a non-depolarizing neuromuscular blocker in a patient with amyotrophic lateral sclerosis leads to an exaggerated pharmocodynamic response.
- When PEEP is increased in a mechanically ventilated patient, dead space increases.
- Hypoactive delirium is treated with intravenous haloperidol.
- Assuming an ethnic minority does not speak English is a form of microaggression.
- Use of perioperative esmolol reduces intraoperative anesthetic requirements.

- Minor surgery is associated with succinylcholine-associated myalgias.
- In patients with increased extracellular fluid volume, medications that mostly distribute in the extracellular compartment may require an increase in the initial dose.

## **2022 GAPS IN KNOWLEDGE REPORT**

- During transsphenoidal resection of a pituitary tumor, allowing hypercapnia can improve conditions for tumor visualization.
- Normal PaCO<sub>2</sub>-ETCO<sub>2</sub> gradient is close to zero in healthy, full term parturients.
- Hypoglycemia is an important potential physiologic derangement following reperfusion during a pancreas transplant.
- Spontaneous abortion is a potential consequence following general anesthesia for appendectomy at 13 weeks' gestation.
- The primary motor cortex is located anterior to the central sulcus.
- According to ACLS guidelines, procainamide is an appropriate therapeutic choice during the treatment of stable wide-complex tachycardia.
- Laryngeal injury is a strong contraindication to transtracheal jet ventilation.