

# Emergency Medicine CAQ Blueprint

Content Area	Percentage
1. Cardiovascular System	10
2. Dermatologic System	4
3. Endocrine System	3
4. Eyes, Ears, Nose, & Throat	6
5. Gastrointestinal System/Nutrition	10
6. Genitourinary System (Male and Female)	5
7. Hematologic System	4
8. Musculoskeletal System	9
9. Neurologic System	8
10. Psychobehavioral Disorders	7
11. Pulmonary System	10
12. Renal System	4
13. Reproductive System (Male and Female)	2
14. Environmental Disorders	2
15. Systemic Infectious Disorders	4
16. Toxicologic Disorders	4
17. Traumatic Disorders	6
18. Procedures & Skills	2

## ***1. CARDIOVASCULAR SYSTEM***

***(10%)***

- A. Acute coronary syndrome
- B. Cardiomyopathy
  - Acute/chronic systolic/diastolic heart failure
- C. Conduction disorders/dysrhythmias
  - Atrial
  - Ventricular
- D. Congenital heart disease
- E. Coronary artery disease
- F. Hypertension
  - Hypertensive emergency
  - Hypertensive urgency
- G. Hypotension
  - Cardiogenic shock
- H. Infectious and inflammatory heart conditions
  - Cardiac tamponade
  - Endocarditis
  - Myocarditis
  - Pericarditis
- I. Lipid disorders
- J. Valvular heart disease
- K. Vascular disorders
  - Aortic aneurysm/dissection
  - Embolism
  - Thrombosis

## ***2. DERMATOLOGIC SYSTEM (4%)***

- A. Desquamation
  - Scarlet fever
  - Stevens-Johnson syndrome
  - Toxic epidermal necrolysis
- B. Diseases/disorders of the hair and nails
- C. Exanthems
  - Erythema infectiosum (fifth disease)
  - Hand-foot-and-mouth disease
  - Hypersensitivity reactions
  - Measles
- D. Infectious diseases
  - Bacterial
  - Fungal
  - Parasitic
  - Viral
- E. Neoplasms
  - Benign
  - Malignant
  - Premalignant
- F. Papulosquamous disorders
  - Dermatitis
  - Eczema
  - Pityriasis rosea
- G. Skin integrity
  - Dermatitis

- Pressure ulcers
  - Stasis dermatitis
- H. Vesiculobullous disease
- Pemphigoid
  - Pemphigus
- I. Other dermatologic disorders
- Acanthosis nigricans
  - Cutaneous manifestations of systemic disease
  - Generalized skin disorders
  - Hidradenitis suppurativa

### **3. ENDOCRINE SYSTEM (3%)**

- A. Adrenal disorders
- Adrenal crisis
  - Adrenal insufficiency
- B. Diabetes
- Diabetic ketoacidosis
  - Hyperosmolar hyperglycemic state
  - Hypoglycemia
- C. Neoplasms
- Benign
  - Malignant
- D. Parathyroid disorders
- Hyperparathyroidism
  - Hypoparathyroidism
- E. Pituitary disorders
- Diabetes insipidus
  - Syndrome of inappropriate antidiuretic hormone secretion (SIADH)
- F. Thyroid disorders
- Hyperthyroidism
  - Hypothyroidism
  - Myxedema
  - Thyroid storm

### **4. EYES, EARS, NOSE, & THROAT (6%)**

- A. Eye disorders
- Central retinal artery occlusion
  - Glaucoma
  - Hyphema
  - Iritis

- Periorbital and orbital cellulitis
  - Retinal detachment
  - Trauma
- B. Ear disorders
- External, middle, and inner ear disorders
  - Hearing loss
- C. Nose/sinus disorders
- Epistaxis
  - Rhinitis
  - Sinusitis
- D. Oral disorders
- Candidiasis
  - Dental disorders
  - Gingivitis
  - Lesions
  - Ludwig angina
  - Salivary disorders
- E. Throat disorders
- Croup/epiglottitis
  - Peritonsillar/retropharyngeal abscess
- F. Foreign bodies
- G. Neoplasms
- Benign
  - Malignant

### **5. GASTROINTESTINAL SYSTEM/NUTRITION (10%)**

- A. Biliary disorders
- Biliary tract disease
  - Cholecystitis
- B. Colorectal disorders
- Abscess/fistula
  - Anal fissure
  - Colitis
  - Constipation
  - Diverticulitis
  - Hemorrhoids
  - Ileitis
  - Inflammatory bowel disease
  - Obstruction
  - Volvulus
- C. Esophageal disorders
- Foreign body

- Gastroesophageal reflux disease
- Rupture
- Stricture
- Varices
- D. Gastric disorders
  - Gastritis
  - Ulcer disease
- E. Hepatic disorders
  - Hepatitis
  - Liver failure
- F. Hernias
  - Hiatal
  - Inguinal
  - Umbilical
  - Ventral wall
- G. Mesenteric disorders
  - Mesenteric ischemia
- H. Metabolic, nutritional, and vitamin disorders
  - G6PD deficiency
  - Hypervitaminosis/hypovitaminosis
  - Obesity
  - Phenylketonuria
- I. Neoplasms
  - Benign
  - Malignant
- J. Pancreatic disorders
  - Pancreatitis
- K. Small intestine disorders
  - Appendicitis
  - Enteritis
  - Gastrointestinal hemorrhage
  - Intussusception
  - Obstruction

**6. GENITOURINARY SYSTEM  
(MALE AND FEMALE) (5%)**

- A. Bladder disorders
  - Cystitis
- B. Neoplasms
- C. Penile disorders
  - Paraphimosis/phimosis
  - Peyronie disease
  - Priapism

- D. Prostate disorders
  - Benign prostatic hypertrophy
  - Prostatitis
- E. Testicular disorders
  - Epididymitis
  - Orchitis
  - Testicular torsion
- F. Urethral disorders
  - Obstruction
  - Prolapse
  - Stricture
  - Urethritis

**7. HEMATOLOGIC SYSTEM (4%)**

- A. Coagulation disorders
  - Bleeding disorders
  - Disseminated intravascular coagulation
  - Emergencies associated with anticoagulant therapy
  - Thrombophilias
- B. Cytopenia
  - Anemias
  - Leukopenia
  - Polycythemia
  - Thrombocytopenia
- C. Hemoglobinopathies
  - Hemochromatosis
  - Sickle cell disease
  - Thalassemia
- D. Immunologic disorders
  - Autoimmune disorders
  - Transfusion reaction
- E. Myelodysplastic disorders

**8. MUSCULOSKELETAL SYSTEM  
(9%)**

- A. Chest/rib disorders
- B. Compartment syndrome
- C. Inflammatory and infectious diseases
  - Osteoarthritis
  - Osteomyelitis
  - Septic arthritis/bursitis
- D. Lower extremity disorders
  - Ankle

- Foot
- Hip
- Knee
- Leg/thigh
- E. Neck and spine disorders
  - Degenerative disk disease
  - Torticollis
- F. Neoplasms
  - Benign
  - Malignant
- G. Rheumatologic disorders
  - Fibromyalgia
  - Gout
  - Osteoporosis
  - Paget disease
  - Rheumatoid arthritis
  - Rickets
  - Systemic lupus erythematosus
- H. Upper extremity disorders
  - Elbow
  - Forearm/upper arm
  - Hand
  - Shoulder
  - Wrist

### ***9. NEUROLOGIC SYSTEM (8%)***

- A. Central nerve disorders
  - Altered mental status (encephalopathies)
  - Cord syndromes
  - Transverse myelitis
  - Vertigo and dizziness
- B. Headaches
  - Migraine
- C. Infectious disorders
  - Encephalitis
  - Spinal epidural abscess
- D. Neoplasms
  - Benign
  - Malignant
- E. Neuromuscular disorders
  - Multiple sclerosis
  - Myasthenia gravis
- F. Peripheral nerve disorders

- Bell palsy
- Carpal tunnel syndrome
- Complex regional pain syndrome
- Guillain-Barré syndrome
- Peripheral neuropathy
- Vertigo and dizziness
- G. Seizure disorders
  - Febrile seizure
  - Status epilepticus
- H. Vascular disorders
  - Atraumatic intracranial hemorrhage
  - Cerebral aneurysm
  - Stroke
  - Temporal arteritis
  - Transient ischemic attack

### ***10. PSYCHOBHAVIORIAL DISORDERS (7%)***

- A. Abuse and neglect
  - Emotional abuse
  - Neglect
  - Physical abuse
  - Sexual abuse
- B. Anxiety disorders
  - Generalized anxiety disorder
  - Panic disorder
  - Phobias
- C. Bipolar and related disorders (Mood disorders)
- D. Depressive disorders (Mood disorders)
  - Major depressive disorder
  - Persistent depressive disorder/dysthymia (Dysthymic disorder)
  - Suicidal/homicidal behaviors
- E. Disruptive, impulse-control, and conduct disorders (Impulse-control disorders not elsewhere classified)
  - Conduct disorder
- F. Dissociative disorders
- G. Feeding and eating disorders (Eating disorders)

H. Neurocognitive disorders (Delirium, dementia, and amnesic and other cognitive disorders)

- Delirium
- Major/mild neurocognitive disorders (Dementias)

I. Neurodevelopmental disorders (Disorders usually first diagnosed in infancy, childhood, or adolescence)

J. Obsessive-compulsive and related disorders (Anxiety disorders)

K. Personality disorders

L. Schizophrenia spectrum and other psychotic disorders (Schizophrenia and other psychotic disorders)

M. Sexual and gender-related disorders

N. Sleep-wake disorders (Sleep disorders)

- Narcolepsy
- Parasomnias

O. Somatic symptom and related disorders (Somatoform disorders)

P. Substance-related and addictive disorders (Substance-related disorders)

Q. Trauma- and stressor-related disorders (Anxiety disorders)

- Adjustment disorders
- Post-traumatic stress disorder

## ***11. PULMONARY SYSTEM (10%)***

A. Infectious disorders

- Acute bronchiolitis
- Acute bronchitis
- Croup
- Empyema
- Influenza
- Lung abscess
- Pertussis
- Pneumonias
- Respiratory syncytial virus infection
- Tuberculosis

B. Neoplasms

- Benign
- Malignant

C. Obstructive pulmonary diseases

- Asthma
- Chronic obstructive pulmonary disease
- Emphysema

D. Pleural diseases

- Pleural effusion
- Pneumothorax

E. Pulmonary circulation

- Cor pulmonale
- Pulmonary embolism
- Pulmonary hypertension

F. Restrictive pulmonary diseases

- Pulmonary fibrosis
- Pneumoconiosis
- Sarcoidosis

G. Other pulmonary disorders

- Acute respiratory distress syndrome
- Cystic fibrosis
- Foreign body aspiration
- Interstitial lung disease
- Pulmonary edema
- Respiratory failure

## ***12. RENAL SYSTEM (4%)***

A. Acute disorders

- Acute kidney injury/acute renal failure
- Pyelonephritis
- Urinary tract infection
- Urosepsis

B. Chronic kidney disease and end-stage renal disease

C. Congenital or structural renal disorders

- Polycystic kidney disease

D. Fluid and electrolyte disorders

- Acid-base disorders
- Dehydration/hypervolemia

- Hyperkalemia/hypokalemia
- Hyponatremia/hyponatremia

E. Neoplasms

- Renal cell carcinoma
- Wilms tumor

F. Nephrolithiasis/urolithiasis

**13. REPRODUCTIVE SYSTEM  
(MALE AND FEMALE) (2%)**

A. Breast disorders

- Mastitis

B. Cervical disorders

C. Complicated pregnancy/obstetric emergencies

- Abortion
- Breech presentation
- Cesarean delivery
- Cord prolapse
- Ectopic pregnancy
- Placenta previa
- Placental abruption
- Postpartum hemorrhage
- Preeclampsia/eclampsia
- Premature rupture of membranes
- Rh incompatibility

D. Contraception

E. Menstrual disorders

F. Neoplasms of the breast and reproductive tract

- Benign
- Malignant

G. Ovarian disorders

- Cysts
- Torsion
- Tubo-ovarian abscess

H. Sexually transmitted infections/pelvic inflammatory disease

I. Uncomplicated pregnancy/normal labor and delivery

J. Uterine disorders

- Endometritis
- Leiomyoma
- Prolapse

K. Vaginal/vulvar disorders

- Bartholin cyst/abscess

- Prolapse
- Vaginitis

**14. ENVIRONMENTAL DISORDERS  
(2%)**

A. Altitude sickness

B. Dive emergencies

C. Exposure illnesses

- Hyperthermia
- Hypothermia

D. Near-drowning

**15. SYSTEMIC INFECTIOUS  
DISORDERS (4%)**

A. Bacterial

- Lyme disease
- Meningitis
- Rocky Mountain spotted fever
- Sepsis
- Tetanus

B. Fungal

C. Parasitic

D. Viral

- HIV/AIDS
- Infectious mononucleosis
- Influenza
- Meningitis
- Rabies
- West Nile virus
- Zika virus

**16. TOXICOLOGIC DISORDERS  
(4%)**

A. Allergic reactions

- Anaphylaxis
- Hypersensitivity reactions

B. Effects of biological/chemical terrorism

C. Envenomation and arthropod bite reactions

D. Ingestion of toxic substances or foreign bodies

- Illicit substances
- Medications
- Metals

E. Inhalation of toxins

- Ammonia
- Carbon monoxide
- Chlorine

**17. TRAUMATIC DISORDERS (6%)**

A. Animal/human bites

B. Electrical injuries

- Electrocution
- Lightning strike

C. Facial injuries

- Eyes
- Ears
- Nose
- Teeth
- Soft tissue

D. Head and spinal injuries

- Closed head injuries
  - Concussion
  - Postconcussion syndrome
  - Traumatic brain injury
- Paralysis

E. Impaired skin integrity

- Burns
- Lacerations

F. Multisystem injuries

- Blast injuries
- Blunt trauma
- Falls
- Injuries from motor vehicle collisions
- Penetrating injuries
  - Gunshot wounds
  - Stab wounds

G. Musculoskeletal trauma

H. Physical/sexual assault

I. Strangulation

J. Trauma in pregnancy

K. Traumatic cardiac injuries

- Cardiac tamponade

**18. PROCEDURES & SKILLS (2%)**

A. Conducting education on modifiable risk factors with an emphasis on primary and secondary prevention

- Diet
- Exercise
- Smoking cessation

B. Managing delivery of a newborn

C. Performing abdominal and gastrointestinal procedures

- Anoscopy
- Focused assessment with sonography for trauma (FAST)
- Gastric lavage
- Placement of a gastrostomy tube
- Placement of a nasogastric tube

D. Performing advanced airway management

- Cricothyrotomy
- Managing difficult airways
- Intubation
  - Endotracheal
  - Nasal
  - Rapid sequence

E. Performing advanced wound management

- Multilayer closure
- Tendon repair
- Wound debridement

F. Performing cardiovascular and thoracic procedures

- Cardioversion
- Central venous access
- Defibrillation
- Focused assessment with sonography for trauma (FAST)
- Interpretation of electrocardiography
- Pericardiocentesis
- Thoracostomy
- Ultrasound-guided vascular access

G. Performing musculoskeletal procedures

- Arthrocentesis
- Fracture/dislocation reduction
- Measurement of compartment pressure

H. Performing resuscitation

- Cardiopulmonary resuscitation
- Fluid and blood component therapy
- I. Performing toxicologic procedures
  - Decontamination
- J. Providing anesthesia
  - Local and regional nerve block
  - Procedural sedation
- K. Providing psychobehavioral care
  - Management of a violent patient

- Psychiatric screening/examinations
- L. Triage and resource management
  - Disaster management
  - Emergency medical services
  - Homeless and at-risk population
- M. Using epidemiologic techniques to evaluate the spread of disease
  - Exposure
  - Risk
  - Transmission