

### **General Medicine Teaching Topics:**

- 1) Chronic pain syndromes and suspected narcotic-seeking (with long-term management including pain clinic referral)
- 2) Appropriate discharge: geriatric and non-geriatric home safety assessment, post-discharge arrangements and their indications (CHOICES, home nursing visits, inpatient rehab, ECF, Select Specialties, hospice)
- 3) Inpatient diabetes management (modifying home meds, etc)
- 4) Management of DKA (including cause workup; indications for ICU transfer, common pitfalls/mistakes)
- 5) Management of hypertensive urgency and emergency (with indications for ICU transfer)
- 6) Hyper/hyponatremia (most common causes, corrective management with indications for levels of aggressiveness)
- 7) Approach to AMS (delirium and obtundation) including indications for CT and for ICU transfer
- 8) Management of EtOH withdrawal (including indications for ICU transfer)
- 9) Workup of syncope, indications for brief vs. expanded workup
- 10) DVT/PE management
- 11) Management of asthma and COPD exacerbations (including indications for ICU transfer)
- 12) Partial SBO and LBO - most common causes and management, including surgical consult role; assessing improvement/danger signs
- 13) Preop evaluation, risk stratification and medical optimization
- 14) Approach to new fever in an inpatient

### **Infectious Diseases Teaching Topics:**

- 1) Management of infected medical devices (lines of different types, pacers, orthopedic pins, filters, grafts, etc.)
- 2) Differential and approach for FUO, with most common causes

Our institution's common pathogens and empiric antibiotics (and rationale) for:

- 3) GI: cholecystitis, cholangitis, SBP, diverticulitis, perirectal abscess
- 4) skin/soft and connective tissue: cellulitis, necrotizing fasciitis, osteomyelitis, endocarditis, surgical wound infection, septic arthritis
- 5) miscellaneous: CAP, HAP, meningitis, UTI, PID/TOA
- 6) 10ish most important (common or serious) antibiotic side effects (not allergies)
- 7) Basic approach to HIV care (treatment indications, classes and side effects of meds, OIs with their typical CD4 count context and prophylaxis management)
- 8) Specific additional ID considerations in diabetes, HIV, renal failure, advanced age, and chronic steroid use
- 9) Approach to known antibiotic "allergies" (true vs. false allergies, cross-reactivity, indications for using alternative agents and for desensitization)
- 10) Fungal infections: most common pathogens/contexts, when to consider them, and empiric approach
- 11) Viral infections: most common pathogens/contexts, when to consider them, and empiric approach
- 12) New/emerging antibiotic classes
- 13) Major infections in transplant recipients, by time frame after transplant

### **Endocrine Teaching Topics**

- 1) Outpatient diabetes (diagnosis, transition from PO meds to insulin, old and new types of Insulin, common and less-common disease complications)
- 2) Inpatient diabetes: DKA/HONKC - signs/symptoms, diagnosis, management, pitfall
- 3) Thyroid disease (hyper/hypo thyroidism symptoms, differential, and management; evaluation of thyroid nodule)
- 4) Adrenal insufficiency (presentation, differential, management)

- 5) Cushing's (diagnosis, management)
- 6) Hormonal bone regulation/calcium metabolism (hypercalcemia, hypocalcemia)
- 7) Endocrine disorders of male reproductive physiology (including hypogonadism)
- 8) Endocrine disorders of female reproductive physiology (amenorrhea, PCOS, perhaps DUB)

### **GI/Liver Teaching Topics**

- 1) Barrett's esophagus and esophageal cancer (presentation/screening, workup, management, outcomes)
- 2) Esophagitis (infectious, pill, eosinophilic) and gastritis – presentation, workup, management, outcomes)
- 3) Peptic Ulcer Disease, including H. Pylori (presentation, workup, management, outcomes)
- 4) Acute Pancreatitis (causes, presentation, management, outcomes)
- 5) Chronic Pancreatitis (causes, presentation, workup, management, outcomes)
- 6) Pancreatic Masses (including cystic; differential, workup, non-onc management)
- 7) Approach to diarrhea, including malabsorption syndromes
- 8) IBD (presentation, differential, workup, acute and long-term management, outcomes)
- 9) Intestinal ischemia (presentation/when to suspect, workup, management options)
- 10) Colon cancer (risk factors, screening, presentation, outcomes)
- 11) Upper GI bleeding (differential with distinguishers in presentation, acute management, endoscopic management techniques, indications for endoscopic vs. IR intervention)
- 12) Lower GI bleeding (differential with distinguishers in presentation, acute management, endoscopic management techniques, indications for endoscopic vs. IR intervention)
- 13) The cirrhotic patient: portal hypertension, varices, hepatic encephalopathy (presentation, acute and long-term management including prophylaxis, outcomes)
- 14) The cirrhotic patient: ascites, SBP, hepatorenal syndrome (presentation, acute and long-term management including prophylaxis, outcomes)
- 15) Fulminant hepatic failure (acute management, transplant indications, outcomes)
- 16) Viral hepatitis (common causes, presentation, general management, outcomes and long-term complications)
- 17) The gallbladder and bile ducts (acute cholecystitis, choledocholithiasis, cholangitis) – presentation, workup, management, outcomes
- 18) Functional bowel disease

### **Hematology/Oncology Teaching Topics**

#### *Hematology:*

- 1) Transfusion (indications, indications for specialized products e.g. leukopoor/CMV-negative, pretreatment, indications for stopping transfusion) and pheresis (indications, complications)
- 2) Hematology Emergencies (TLS, Blast crisis)
- 3) Anemia (presentation, common causes by patient demographic, initial workup, secondary workup if unrevealing, management)
- 4) Leukopenia and Thrombocytopenia (most common causes, presentation, workup)
- 5) Hypo- and hyper-coagulable disorders (most common causes, presentations, workup, management)
- 6) Hodgkin's Lymphoma (presentation, diagnosis, staging, treatment, outcomes)
- 7) Non-Hodgkin's Lymphoma (presentation, diagnosis, staging, treatment, outcomes)
- 8) Multiple Myeloma and MGUS (presentation, diagnosis, management, outcomes)
- 9) The acute leukemias (presentation, diagnosis, staging, treatment overview without specific chemo protocols, outcomes)
- 10) The chronic leukemias (presentation, diagnosis, staging, treatment overview without specific chemo protocols, outcomes)
- 11) TTP and ITP (presentation, diagnosis, management, outcomes)
- 12) Sickle cell anemia (presentation, pain crisis management, complications, outcomes)

#### *Oncology:*

- 1) Common treatment side effects and their management (constipation, nausea/vomiting, pain, radiation)

- sequellae, etc)
- 2) Oncologic Emergencies (spinal cord compression, SVC syndrome, febrile neutropenia)
  - 3) Lung Cancer (staging, treatment overview without specific chemo protocols, prognosis)
  - 4) Breast Cancer (staging, treatment overview without specific chemo protocols, prognosis)
  - 5) Colon Cancer (staging, treatment overview without specific chemo protocols, prognosis)
  - 6) Prostate Cancer (staging, treatment overview without specific chemo protocols, prognosis)
  - 7) Skin cancers (staging, treatment overview without specific chemo protocols, prognosis)

### **Rheumatology Teaching Topics:**

- 1) Approach to joint pain (differential, exam, workup, red flags/indications for aspiration)
- 2) Joint aspiration technique for knee and other commonly tapped joints, and septic arthritis (workup, management)
- 3) Approach to lower back pain (rheumatologic differential, workup, management, outcomes)
- 4) Systemic Lupus Erythematosus (presentation, exam, management, variants, complications and emergencies, outcomes) – may need two lectures
- 5) Osteoarthritis and rheumatoid arthritis (findings, workup, management including disease-modifying agents)
- 6) Large/medium/small vasculitis syndromes (most common, most severe, presentation, workup, management)
- 7) Fibromyalgia and myofascial pain (diagnosis, exam and ruling out, management, outcomes)
- 8) Scleroderma (presentation, differential, workup, management, outcomes)
- 9) Gout and Pseudogout (presentation, differential, workup including role of aspiration, management, outcomes)
- 10) Shoulder pain and weakness (rheumatologic differential, workup, management, outcomes)
- 11) Spondyloarthritis i.e. AS, reactive arthritis, psoriasis, etc (presentation, workup, management)
- 12) Inflammatory myopathies i.e. DM, PM, IBM (presentation, workup, management, outcomes)
- 13) Amyloidosis (presentation, workup, management, outcomes)

### **Cardiology Teaching Topics**

- 1) Atrial Fibrillation and flutter (rate vs. rhythm control/ablation, anticoagulation, RVR)
- 2) Acute Coronary Syndrome (differentiate UA, NSTEMI, STEMI; management strategies including recent changes; critical complications and their red flags)
- 3) Malignant HTN/HTN Emergency/Urgency
- 4) Outpatient heart failure (causes; signs, symptoms and lab values; staging; overview of systolic vs diastolic chronic management and outcomes)
- 5) Decompensated (inpatient) heart failure (acute causes/workup, management including assist devices and their indications)
- 6) Heart block (types, management with indications for pacing) and other bradycardias (management)
- 7) VT and SVT (diagnosis, causes, management)
- 8) Aortic stenosis (presentation and exam, natural history, management with indications for surgical referral, outcomes)
- 9) Infectious endocarditis (presentation and findings, management, cardiac complications)
- 10) Pericarditis/Pericardial effusion (presentation/findings, workup, management)
- 11) Peripheral vascular disease (renal artery stenosis, PVOD, etc) – presentation/findings, workup, management
- 13) Stress testing and other diagnostic techniques (cardiac MRI, etc) – indications, choosing studies
- 14) “Stable” CAD (presentation, basic management including role of intervention)
- 15) Pulmonary HTN (most common causes, presentation, workup, management, outcomes)
- 16) Preop evaluation – cardiac risk stratification and optimization
- 17) Syncope (cardiac causes, cardiac workup)
- 18) Systematic approach to EKGs

### **Nephrology Teaching Topics**

- 1) Clinical evaluation of kidney function (determining GFR from Cr/24-hr urine/MDRD; interpreting UA findings; indications for biopsy; renal drug dosing)
- 2) Fluid and Electrolytes – hyper- and hyponatremia (most common causes, workup, management)
- 3) Fluid and Electrolytes – potassium (common causes of derangements, workup, management)
- 4) Acid/Base Disorders (most common, systematic approach to lab interpretation for diagnosis)
- 5) Hypertension (definition and classification, workup, management, complications)
- 6) Acute renal failure (most common prerenal, renal and postrenal causes in the ambulatory and outpatient settings, initial and expanded workup, management)
- 7) Chronic kidney disease (most common causes, management for preserving function, complications including phos/calcium derangements)
- 8) Chronic dialysis (decision to start, choosing a method, vascular access issues, complications)
- 9) Nephrolithiasis (risk factors, screening and prevention, diagnosis, management)
- 10) Genetic disorders causing renal disease (most common, presentation, workup, disease-modifying management)
- 11) Glomerular diseases (nephritic vs. nephrotic presentation and most common causes of each, and management)
- 12) Kidney transplantation (indications/contraindications/mortality benefit, workup, basic immunosuppressive regimen and side effects, complications)

### **Pulmonary Teaching Topics**

- 1) Pulmonary imaging (major study types and their indications)
- 2) PFTs (indications and contraindications, selecting features, interpretation, use in management)
- 3) Asthma, with stepwise approach to treating chronic stable asthma and exacerbations
- 4) COPD, with stepwise approach to treating chronic stable COPD and exacerbations
- 5) Pneumonia (empiric and focused management, role of bronchoscopy, role of PPV, outcomes, complications with abscess management)
- 6) PE/DVT (indications for workup, workup flowchart, acute- and long-term management)
- 7) Sleep Apnea/Pickwickian syndromes/etc (indications for workup, management, complications)
- 8) CF (chronic management, empiric management of exacerbations, outcomes)
- 9) ILD (presentation, workup, management, outcomes)
- 10) Pleural effusions (differential by appearance, workup with indications for thoracentesis)
- 11) Fungal pulmonary disease (most common, presentation,/when to suspect it, workup, management)
- 12) Mycobacterial lung disease i.e. TB and MAC (presentation, workup, management)
- 13) Neuromuscular respiratory disorders (most common, presentation, workup, management)

### **Critical Care Teaching Topics**

- 1) Shock/Sepsis (most common etiologies, early goal-directed management, outcomes)
- 2) ABGs (expert tricks, interpretation, common pitfalls, use in decisions about intubation and vent management)
- 3) Vents (initial settings, appropriate scenarios for manipulating each major parameter)
- 4) Pressors (empiric stepwise approach, side effects, indications and contraindications for specific pressors, role of vasopressin)
- 5) ARDS/ALI (most common causes, indications for and basics of lung-protective ventilation, outcomes)
- 6) Renal failure/CRRT (most common causes in ICU, indications for specific dialysis methods)
- 7) Hepatic failure (most common causes in ICU, acute management, complications)
- 8) Overdoses (most common, basic management with most important parameters to monitor, HD indications)
- 9) Nutrition (approach to tube feeds, indications for TPN, monitoring nutritional status)
- 10) Procedures (indications and expert tricks for neck vs. fem lines, art lines, and if time)

permits, paracentesis/thoracentesis)  
11) DIC (setting, diagnosis, complications, management)