APEA EXAM STUDY GUIDE

Must Know Topics For 3P Exam

Cardiovascular

a. Atrial Fibrillation:

Atrial fibrillation (AF) is a common arrhythmia characterized by rapid and irregular beating of the atria. It can lead to thromboembolic events, particularly stroke, due to the formation of blood clots in the left atrial appendage. Management includes rate control, rhythm control, and anticoagulation therapy.

b. Peripheral Artery Disease:

Peripheral artery disease (PAD) is a condition where narrowed arteries reduce blood flow to the limbs, often causing leg pain during exertion (claudication). Treatment focuses on lifestyle changes, medications to improve blood flow, and possibly surgical interventions.

c. Varicose Veins:

Varicose veins are enlarged, twisted veins that often appear blue or dark purple. They occur when valves in the veins fail, leading to pooling of blood. Treatment options include lifestyle modifications, compression stockings, sclerotherapy, and surgical procedures.

d. Heart Failure:

Heart failure is a chronic condition where the heart is unable to pump sufficient blood to meet the body's needs. Symptoms include shortness of breath and fatigue. Management involves lifestyle changes, medications such as diuretics and ACE inhibitors, and sometimes devices or surgery.

e. Peripheral Edema:

Peripheral edema refers to swelling in the lower extremities due to fluid accumulation. It can result from various causes including heart failure, kidney disease, or venous insufficiency. Treatment depends on the underlying cause and may involve diuretics or compression therapy.

f. Coronary Artery Disease:

Coronary artery disease (CAD) is caused by the buildup of plaque in coronary arteries leading to reduced blood flow to the heart muscle. Risk factors include hypertension and hyperlipidemia. Treatment includes lifestyle changes, medications like statins, and revascularization procedures.

g. Anticoagulation:

Anticoagulation refers to medications that prevent blood clot formation (e.g., warfarin). They are crucial for managing conditions like AF and CAD to reduce stroke risk but require careful monitoring due to bleeding risks.

h. Hypertension:

Hypertension is defined as persistently elevated blood pressure which increases cardiovascular risk significantly. Management includes lifestyle modifications and antihypertensive medications such as diuretics or ACE inhibitors.

i. Infectious Endocarditis:

Infectious endocarditis is an infection of the inner lining of the heart chambers or valves caused by bacteria or fungi. Symptoms may include fever and heart murmurs; treatment typically involves prolonged antibiotic therapy.

Dermatology

a. Psoriasis:

Psoriasis is a chronic autoimmune skin disorder characterized by red patches covered with thick silvery scales due to accelerated skin cell turnover. Treatments include topical therapies, phototherapy, and systemic agents like biologics.

b. Tinea Corporis:

Tinea corporis is a fungal infection affecting the skin on non-hairy parts of the body presenting as ring-shaped lesions with raised edges and clear centers ("ringworm"). Antifungal creams are commonly used for treatment.

c. Scabies:

Scabies is a contagious skin infestation caused by Sarcoptes scabiei mites resulting in intense itching and rash due to allergic reactions to mite feces and eggs; treatment involves topical permethrin or oral ivermectin.

d. Herpes Zoster:

Herpes zoster (shingles) results from reactivation of varicella-zoster virus causing painful vesicular rash along dermatomes; antiviral medications can help reduce severity if administered early.

e. Dermal Cyst:

Dermal cysts are benign growths filled with keratin that form under the skin; they are usually asymptomatic but can become inflamed or infected requiring surgical removal if symptomatic.

f. Keloid:

Keloids are raised scars that extend beyond original injury sites due to excessive collagen deposition during healing; treatments may include corticosteroid injections or surgical excision but recurrence is common.

g. Tinea Capitis:

Tinea capitis is a fungal infection of the scalp presenting as hair loss with scaling; it requires systemic antifungal treatment for effective resolution.

h. Atopic Dermatitis:

Atopic dermatitis (eczema) is a chronic inflammatory skin condition characterized by dry itchy skin often associated with allergies; management includes moisturizers and topical corticosteroids.

i. Urticaria:

Urticaria (hives) presents as raised itchy welts on the skin due to allergic reactions; treatment focuses on antihistamines for symptom relief while identifying triggers helps prevent recurrence.

j. Melanoma:

Melanoma is a serious form of skin cancer arising from melanocytes characterized by asymmetrical moles with irregular borders; early detection through screening leads to better outcomes often requiring surgical excision followed by possible immunotherapy or chemotherapy depending on stage.

k. Acne:

Acne vulgaris results from clogged pores leading to pimples primarily affecting adolescents; treatments range from topical retinoids and benzoyl peroxide to systemic antibiotics depending on severity.

Eye, Ear, Nose, and Throat

- a. Visual Acuity: Visual acuity measures clarity of vision using standardized tests like Snellen chart assessments; important for diagnosing refractive errors requiring corrective lenses.
- b. Cataract: Cataracts involve clouding of the lens leading to blurred vision; surgical intervention through phacoemulsification restores clarity effectively.
- c. Vertigo: Vertigo describes sensations of spinning often linked with inner ear disorders like Meniere's disease; management focuses on vestibular rehabilitation exercises.
- d.Diabetic Retinopathy: Diabetic retinopathy results from retinal damage due to prolonged hyperglycemia manifesting as microaneurysms; regular eye exams aid early detection allowing timely laser treatments.
- e.Papilledema: Papilledema indicates optic disc swelling due increased intracranial pressure necessitating imaging studies for underlying causes.
- f. Hyperopia: Hyperopia (farsightedness) occurs when distant objects are seen clearly while near objects appear blurry; corrective lenses help restore normal vision.