MCQs in Ophthalmology

abnormalities of the optic lens are recognised in

A.homocystinuria B.hypoparathyroidism C.dystrophia myotonia D.wilsons disease E.congenital rubella

answ...ABCDE....

Recognized features of diabetic retinopathy include:

A flame haemorrhages B arteriovenous nipping C new blood vessels overlying the optic discs D macular degeneration E macular oedema

true:

ace comment : Diabetic retinopathy is associated with exudates (cotton wool spots and hard exudates), haemorrhages, macular oedema, venous changes and neovascularisation. AV nipping is associated with hypertensive retinopathy. [/HIDE]

When considering diabetic retinopathy which of the following statements is most accurate:

- 1) Microaneurysms represent sacular dilatation of retinal arterioles
- 2) Hard exudates represent calcium deposites in the retina
- 3) Cotton wool spots represent infarcts of the nerve fibre layer of the retina
- 4) Haemorrhages close to the fovea are not potentially sight threatening
- 5) Laser photocoagulation is applied directly to new vessels to destroy them

true:

3

MAs are capillary aneurysms.

HEs are collections of exudated lipid and protein.

C is correct, multiple CWS are a pre-proliferative sign. Haemorrhages (or HEs) close to the fovea represent a risk of macular oedema and are therefore sight threatening Laser destroys ischaemic but viable retina to reduce the secretion of angiogenic growth factors and allow new vesel regression, it is not applied directly to new vessels as this would cause bleeding. [/HIDE]

A 30-year-old female presents to the eye clinic with an acute history of pain and blurring in the right eye. Examination reveals a visual acuity of 6/36 in the right eye but 6/6 in the left eye, a central scotoma in the right eye, with a right swollen optic disc.

What is the most likely diagnosis?

- 1) Compression of the optic nerve
- 2) Cavernous sinus thrombosis
- 3) Glaucoma

4) Optic neuritis

5) Retinal vein occlusion

[HIDE]true:

4 The acute presentation with central scotoma, reduced visual acuity and a swollen optic disc in a young female suggests a diagnosis of MS with a retrobulbar neuritis.[/HIDE]

left homonymous hemianopia may be caused by which of the following lesions:

- A A lesion of the optic chiasm
- B A lesion of the right occipital lobe
- C Right Optic Neuritis
- D An attack of migraine
- E Occlusion of the anterior cerebral artery

true

bdeComments:

A left homonymous hemianopia would be associated with a right occipital lobe lesion and also with migraine. The optic chiasmal lesion is likely to cause a bitemporal hemianopia. The anterior cerebral artery supplies the frontal lobes and the superior aspect of the brain and may be associated with a homonymous hemianopia. [/HIDE]-----

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EYE EMERGENCIES:

Which of the following conditions does NOT require emergency ophthalmological management?

Anterior uveitis Acute angle-closure glaucoma Orbital floor fracture Orbital cellulitis Corneal ulcer

2. Which of the following is contraindicated in the early management of a patient with hyphema?

Steroids Cycloplegics IOP lowering agents Frequent visits to the ophthalmologist None of the above

3. A 40 year old lady complains of left eye redness of 2 days duration associated with photophobia and watery discharge. She reports history of URTI that started one week ago.

On exam: vision OU= 20/20. Cornea reveals multiple dendritic lesions that

stain well with fluorescein as well as superficial punctate keratitis.

Which of the following is the most appropriate management?

Topical antibiotics (Fucithalmic) Topical antibiotics + patching No antibiotics, no patching Only patching None of the above

4. Which of the following is NOT a feature of acute anterior uveitis?

| Eye pain |
|----------------------|
| Keratic precipitates |
| Busacca nodules |
| Ciliary injection |
| Mid-dilated pupil |

5. Which of the following is specific for the diagnosis of allergic conjunctivitis?
Eye redness
Itching
Foreign body sensation
Excessive lacrimation
None of the above

CORNEA/EXTERNAL DISEASES

Which of the following is true about keratoconus?

It is classified as a corneal dystrophy resulting in severe corneal thinning It is associated with many systemic conditions including Down's syndrome. It is a progressive condition that leads to increasing degrees of hyperopia. Only A and B All of the above 2. Indications for penetrating keratoplasty include all of the following EXCEPT:

Advanced keratoconus Macular dystrophy Thick central corneal scar Perforating corneal ulcer Age-related macular degeneration

3. Corneal grafts cannot be collected from donors if the following condition(s) exist(s) in the donor:

Presence of AIDS History of cataract surgery Death of unknown origin Death of more than 10 hours duration All of the above

4. Treatment of blepharitis might include:

Lid hygiene Topical erythromycin Systemic doxycycline A and B only All of the above

5. Which organism is the most common cause of blepharitis?

Staphylococcus aureus Staphylococcus epidermidis Streptococcus Pseudomonas Hemophilus influenzae 6. Slit-lamp findings in vernal catarrh include all of the following EXCEPT: Conjunctival injection

Giant papillae Herbert's pits Tranta's dots Shield ulcers

7. Presenting symptoms of viral conjunctivitis do NOT include:

Watery discharge Diffuse conjunctival injection Foreign body sensation Pain Itching

8. Corneal topography can be used for:

Diagnosing keratoconus Before cataract surgery to determine the curvature of the cornea Before photorefractive surgery Detecting astigmatism All of the above

9. Which of the following is the first line management of keratoconus?Soft contact lensesHard contact lensesPenetrating keratoplastyA and B onlyAll of the above

10. Complications of contact lens wear include all of the following EXCEPT:
Superficial punctate keratitis
Corneal ulceration
Giant papillary conjunctivitis
Keratoconjunctivitis sicca
Superior limbal keratitis

11. Drugs that cause corneal deposits include all EXCEPT:PhenothiazinesThiazidesAmiodaroneChloroquineHydroxychloroquine

NEUROOPHTHALMOLOGY:

A patient with optic neuritis usually presents with:

Decreased vision Eye pain Positive APD Pale optic nerve head All of the above

2. Papilledema differs from optic neuritis in which of the following?

It is usually bilateral It is more common in females It is accompanied with eye pain and blurring of vision It is associated with color vision defects It may resolve without any treatment 3. Third nerve (oculomotor nerve) palsy in diabetics is characterized by:

Ptosis Abnormal pupillary reaction Normal pupillary reaction A and B A and C

- 1. Dorsal ganglia:
 - a. satellite cells in the ganglion
 - b. all neurones are pseudo-unipolar
 - c. unmyelinated fibres are found
 - d. have multiple synapses
 - 2. Schwann cells:
 - a. separate from neurone by endoneurium
 - b. can cross several nodes of Ranvier
 - c. contains a high concentration of mitochondria
 - d. produces myelination for peripheral neurones
 - e. arise from neural crest
 - 3. Pyramidal tract:
 - a. complete decussation above the level of foramen magnum
 - b. complete myelinated at birth
 - c. contains fibres from cerebellum
 - 4. Intake of 200g of glucose would:
 - a. increase glycogen synthesis in both muscle and liver
 - b. inhibits gluconeogenesis from protein
 - c. inhibits liponeogenesis
 - d. increase protein breakdown
 - e. reduce utilization of glucose of muscle
 - 5. Corneal transparency depends on:
 - a. metabolic pump in endothelium
 - b. zonular occludens in endothelium
 - c. glycosaminoglycans in stroma
 - d. irrigation by calcium free solution in anterior chamber during operation

- e. irrigation by bicarbonate free solution in anterior chamber during operation
- 6. Insulin:
- a. is essential in glucose absorption by the gut
- b. inhibit lipid synthesis from carbohydrate
- c. is metabolized by enzymes of liver
- d. is partially controlled by somatostain from islet delta cells
- e. actively transport potassium into the cells
- 7. pH 7.25, Pa CO2 3.3 kPa, PaO2 12kPa is compatible with:
- a. diabetic ketoacidosis
- b. hysterical overbreathing
- c. administration of ammonium chloride
- d. vomiting because of pyloric obstruction
- e. severe diarrhoea
- 8. Choroid plexus is present in:
- a. anterior horn of lateral ventricle
- b. inferior horn of lateral ventricle
- c. aqueduct
- d. third ventricle
- e. fourth ventricle
- 9. Cushing syndrome causes:
- a. obesity
- b. hirsutism
- c. hypokalaemia
- d. clubbing of fingers
- e. osteoporosis

10. PCR:

- a. in-vitro enzymatic amplification of specific DNA
- b. useful in the diagnosis of microbial and viral infection
- c. seldom have false positive because of high specificity
- d. can detect HIV before seroconversion
- e. cannot detect RNA

- 1. The medial wall of the orbit is formed by:
 - a. the frontal process of the maxilla
 - b. ethmoid bone
 - c. lacrimal bone
 - d. the greater wing of sphenoid
 - e. the frontal bone

2. Paranasal sinuses:

a. the posterior ethmoidal sinuses open in the superior meatus

b. the frontal sinus opens into the superior meatus

c. the anterior ethmoidal sinus opens into the superior meatus

d. the lymphatics of the anterior, middle and posterior ethmoidal sinuses all drain into the retropharyngeal nodes

e. the medial wall of the maxillary sinus is formed solely by the maxilla

3. Skull:

a. maxillary nerve enters the pterygopalatine fossa via the foramen ovale

b. the middle meningeal artery goes through the foramen spinosum in the middle cranial

fossa

c. the greater petrosal nerve goes through the foramen rotundum before forming the nerve of pterygoid canal

d. the jugular foramen transmits the inferior petrosal sinus, the ninth, tenth, eleventh cranial nerves and the large sigmoid sinus from front to back

e. the lesser petrosal nerve enters the foramen ovale

4. Vascular supply of the eyeball:

a. anastomosis exists between the dorsal nasal branch of ophthalmic artery and the angular artery fo the facial artery

b. anastomosis exists between recurrent meningeal branch of the lacrimal artery and the middle meningeal branch of the internal maxillary artery

c. the cilio-retinal artery present in 50% subjects will enter the retina on the temporal side of the optic disc

d. most venous blood from the eyeball drain into the superior ophthalmic vein and enters the cavernous sinus via the inferior orbital fissure

e. the integrity of both retinal and choroidal circulation are required for vascular supply to the eye

- 5. Hypokalaemia occurs in:
- a. Addison's disease
- b. Conn's syndrome
- c. starvation
- d. vomiting
- e. surgical trauma
- 6. The following structures are mesodermal in origin:
- a. the dilator muscle fo the iris
- b. the iris stroma
- c. the ciliary muscle
- d. the ciliary epithelium
- e. levator palpebrae superioris
- 7. The following are situated in the dorsal midbrain:
- a. nucleus of Cajal
- b. nucleus of the posterior commissure
- c. rostral interstitial nucleus of the medial longitudinal bundle
- d. third cranial nerve nucleus
- e. Edinger-Westphal nucleus
- 8. Abnormal colour vision may be found in patients on treatment with:
- a. digitalis
- b. chloroquine
- c. gold
- d. indomethacin
- e. isoniazid
- 9. The following statements are true:
- a. the larger the sample size, the greater the standard error
- b. a value of p<0.01 is less significant then p>0.01
- c. data which is non-parametric is assumed to be normally distributed
- d. in a t-test, the null hypothesis is assumed in all cases
- e. in a normal distribution the mean, mode and median are equal in value
- 10. Molluscum contagiosum:
- a. is most common in young adults

- b. is caused by infestation with lice
- c. lesions are waxy nodules
- d. may primarily involve the lid skin or conjunctiva
- e. infected cells contain eosinophilic inclusion bodies.
- 1. Vitamin B12:
 - a. absorption affected in achlorhydria
 - b. absorption requires intrinsic factor synthesized by body of stomach
 - c. deficiency occurs if the parietal cells are lost
 - d. deficiency causes hypersegmentation of the neutrophil nucleus
 - e. increased mean cell volume of the erythrocytes occurs in deficiency
 - 2. The following antibiotics inhibit cell wall synthesis:
 - a. vancomycin
 - b. gentamicin
 - c. polymyxin
 - d. sulphonamides
 - e. cephalosporin
 - 3. Lid tumours with malignant potential include:
 - a. neurofibroma
 - b. basal cell papilloma
 - c. senile keratosis
 - d. keratoacanthoma
 - e. solar keratosis
 - 4. Corneal dystrophy containing amyloid include:
 - a. Avellino dystrophy
 - b. lattice dystrophy
 - c. granular dystrophy
 - d. macular dystrophy
 - e. Schyneder dystrophy
 - 5. Saccadic eye movements:
 - a. may be vertical
 - b. may be torsional
 - c. may occur during sleep
 - d. the velocity may be voluntarily controlled

- e. maximum velocity is 2000 per second
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- e. levator palpebrae superioris
- 8. Extraocular muscles:
- a. have a sensory nerve supply
- b. have microscopic appearance similar to striated muscles
- c. lateral rectus is supplied in part by the lacrimal artery
- d. inferior rectus is supplied in part by the infra-orbital artery
- e. the lateral rectus has the smallest muscle mass
- 9. The following are true about enzymes:
- a. cyclooxygenase converts leucotriene into arachidonic acid
- b. aldose reductase converts glucose to sorbitol
- c. aldose reductase converts galactose to dulcitol
- d. tyrosinase converts DOPA to dopqauinone
- e. galatose kinase converts galactose-1-phosphate to glucose-1-phosphate
- 10. Corynebacterium:
- a. is Gram positive coccus
- b. are a constituent of the normal commensal population in the conjunctival sac
- c. causes membranous conjunctivitis
- d. is a recognized cause of phlyctenular conjunctivitis
- e. is widely resistant to antibiotics

- 1. Abnormal colour vision may be in patients on treatment with:
 - a. digitalis
 - b. chloroquine
 - c. gold
 - d. indomethacin
 - e. isoniazid
 - 2. Autosomal dominant inheritance is seen in:
 - a. homocystinuria
 - b. Marfan's syndrome
 - c. Fabry's disease
 - d. dystrophia myotonica
 - e. Best's macular dystrophy
 - 3. X-linked inheritance is seen in:
 - a. tritanopia
 - b. deuternomaly
 - c. oculocutaneous albinsim
 - d. choroideremia
 - e. histiocytosis X
 - 4. The refractive index of the following exceed that of the cornea:
 - a. crystalline lens cortex
 - b. crystalline lens nucleus
 - c. aqueous humour
 - d. vitreous humour
 - e. crown glass
 - 5. Light:
 - a. may be absorbed by the normal human lens
 - b. rays may be deviated by collagen fibres of the cornea
 - c. composed of waves exactly in phase is termed polarized
 - d. of one pure wavelength is termed collimated
 - e. diffraction is caused by the cornea
 - 6. The following statements about standard deviation are true:
 - a. standard deviation of sample is the same as population standard deviation
 - b. standard deviation equals the square of the variance

- c. 95% of observations lie within one standard deviation of the mean
- d. the standard deviation depends on the number of observations
- e. the standard deviation always has a positive value
- 7. The following are true:
- a. the larger the sample size, the greater the standard error
- b. a value of p<0.01 is less significant than p>.01
- c. data which is non-parametric is assumed to be normally distributed
- d. in a t-test, the null hypothesis is assumed in all cases
- e. in a normal distribution, the mean, mode and median are equal in value.
- 8. In the chi squared test:
- a. the value of chi-square may be negative
- b. the higher the chi-square value, the greater the significance
- c. the null hypothesis is assumed in all cases
- d. the difference between observed and expected frequencies is measured
- e. p<0.05 is conventionally accepted as significance
- 9. The following are true about neurofibromatosis:
- a. it is an autosomal dominant condition
- b. auxillary freckles are pathognomonic
- c. pulsatile proptosis is a feature
- d. iris nodules called Lisch's nodules are composed of naevi
- e. cafe au lait spot may be the only sign

10. Oculocardiac reflex:

- a. occurs at any age
- b. manifests as tachycardiac and high blood pressure
- c. is a response to extraocular muscle traction
- d. the efferent pathway is via third nerve
- e. premedication with atropine can abolish the reflex
- 1. Diazepam used in premedication of local analgesia gives the effects of:

a. amnesia

b. reduction of muscle tone

- c. disorientation
- d. depression of respiration
- e. emetic effects
- 2. The surgical limbus of the eye:
- a. is defined by Schwalbe's line
- b. is posterior to the anatomical limbus
- c. incision along which will pass in front of trabecular meshwork
- d. incision along which will pass posterior to the canal of Schlemm
- e. is anterior to the conjunctival limbus

3. The following are true about corneal ulcer:

a. those due to Morexella Liquefaciens usually give rise to severe hypopyon

b. with greenish exudate or hypopyon is a pathognomonic feature of Pseudomonas aeruginosa

c. if caused by pneumococcal usually spread from central to the periphery

d. hypopyon is sterile in bacterial corneal ulcer with intact Descemet's membrane usually have sterile hypopyon

e. hypopyon is sterile in fungal corneal ulcer with intact Descemet's membrane.

4. Pseudomonas aeruginosa is sensitive to:

- a. carbenicillin
- b. gentamicin
- c. cefuroxime
- d. ofloxacin
- e. chloramphenicol

5. In treating CMV retinitis with foscarnet, the following complications may occur:

- a. thrombophlebitis
- b. hypercalcaemia
- c. haematological side effect
- d. cardiac arrhythmia
- e. renal dysfunction
- 6. The following statements are true:
- a. chloramphenicol will give rise to optic neuritis

b. visual field loss caused by ethambutol may improve 1 month after cessation of the drug

c. the severity of nystagmus due to phenobarbitol is not dose-related

- d. chlorothiazide may give rise to xanthopsia
- e. retinal artery thrombosis may be a complication of oral contraceptive pill
- 7. Actinomyces Israeli infection:
- a. involve lacrimal sac
- b. involve lung
- c. is an aerobic coccobacilli
- d. is commensal of nasal cavity
- e. involve ileocaecal region
- 8. Which of the following drugs may cause optic atrophy:
- a. isoniazid
- b. chloramphenicol
- c. streptomycin
- d. sulfonamide
- e. rifampicin

9. Which of the following statement is correct:

a. most of the noradrenaline released from the sympathetic nerve vesicle is metabolized

by the enzyme catechol--methyl transferase

b. adrenaline can penetrate the corneal epithelium well and decrease aqueous humour production

- c. adrenaline may produce subepithelial deposit in conjunctiva
- d. phenylepherine hydrochloride is both a and b receptor agonist
- e. isoproterenol may constrict conjunctival blood vessel

10. DNA virus include:

- a. adenovirus
- b. molluscum contagiosum
- c. cytomegalovirus
- d. measles
- e. mumps virus

- 1. Vitamin C deficiency causes:
 - a. thrombosis
 - b. subconjunctival haemorrhage
 - c. osteoporosis
 - d. Bitot's spots
 - e. delayed wound healing
 - 2. Regarding pituitary hormones:
 - a. acromegaly is due to acidophilic adenoma
 - b. diabetes mellitus is a complication of long-term acromegaly
 - c. bromocriptine causes hyperprolatinaemia
 - d. anterior pituitary hormone release is mainly mediated by hypothalamic releasing factors
 - e. overproduction of TSH is the most common cause of hyperthyroidism
 - 3. Diseases associated with Epstein-Barr virus include:
 - a. carcinoma of cervix
 - b. nasopharyngeal cancer
 - c. lymphoma
 - d. maxillary sinus carcinoma
 - e. keratoacanthoma
 - 4. Clostridium:
 - a. forms spores
 - b. is anaerobic
 - c. could easily be destroyed by normal disinfectant
 - d. produces endotoxin which is responsible for tetanus
 - e. is Gram positive
 - 5. Streptococci:
 - a. form spores
 - b. cause abscess
 - c. are responsible for erysipelas
 - d. produce coagulase
 - e. are non-motile
 - 6. Cornea healing in epithelium:
 - a. migration of epithelial cell from limbus toward the centre
 - b. intensive gentamicin eye drop delay epithelial healing
 - c. hemidesmosome from between cells within 24 hours in re-epithelization
 - d. not affected by damage to basement membrane
 - e. are affected by the use of anaesthetic eyedrop

- 7. Relationship within the extraocular muscle cone:
- a. lacrimal nerve passes above the cone
- b. trochlear nerve passes above the cone
- c. nasociliary nerve passes above the cone
- d. recurrent lacrimal artery traverses the cone
- e. superior ophthalmic vein passes through the muscle cone
- 8. The followings are derivatives of neurocrest tissue:
- a. corneal stroma
 - b. ciliary muscle
 - c. lens
 - d. corneal endothelium
 - e. iris stroma
 - 9. The ciliary ganglion:
 - a. measures about 4 mm in size
 - b. is lateral to the optic nerve
 - c. it gives rise to long ciliary nerve
 - d. contains a sensory root
 - e. if damaged causes a dilated pupil which does not react to light

10. The medial wall of the orbit is made up of the following bones:

- a. ethmoid bone
- b. maxillary bone
- c. lacrimal bone
- d. palatine bone
- e. sphenoid bone
- 1. Ophthalmic artery:
 - a. cilio-retinal artery is present in 30% of the subjects
 - b. the site where it joins the internal carotid is a common site for formation of aneurysm
 - c. long posterior ciliary artery supply the fovea
 - d. marginal and peripheral arcade behind the optical septum supply the upper lid
 - e. gives rise to 2 long ciliary arteries

- 2. Transparency of the cornea depends on:
- a. the endothelium integrity
- b. integrity of epithelium
- c. absence of blood vessels
- d. absence of nerve fibres
- e. absence of keratocytes

3. Prolonged immuno-suppression is associated with:

- a. non-Hodgkin's lymphoma
- b. pneumocystic carinii pneumonia
- c. basal cell carcinoma
- d. cutaneous melanoma
- e. posterior subcapsular cataract

4. Nerve supply of the iris:

a. the iris receives only autonomic nerve supply

b. the long ciliary nerves are branches fo the naso-ciliary nerve of the ophthalmic division of the trigeminal nerve

c. the short ciliary nerve arises from the ciliary ganglion and contain pre-ganglionic parasympathetic nerve fibres

d. the parasympathetic innervates the constrictor papillae

e. the parasympathetic nerve fibres to the iris originates in the Edinger-Westphal nucleus of the trigeminal nerve.

5. Delayed visual maturation:

- a. can be diagnosed with visual evoked potential
- b. can be diagnosed by ERG
- c. can be diagnosed by EOG
- d. is characterized by retinal neovascularization
- e. is characterized by nystagmus
- 6. Streptococcus:
- a. is motile
- b. forms spores
- c. is more virulent if it is coagulase positive
- d. causes erysepilas
- e. is largely sensitive to vancomycin

- 7. The following virus virus is associated with malignant tumour:
- a. human papilloma virus
- b. hepatitis B
- c. hepatitis C
- d. Epstein-Barr virus
- e. cytomegalovirus
- 8. In sympathetic ophthalmitis:
- a. inflammation begins in the sympathizing eye first
- b. infiltrate first appears in the retina
- c. optic nerve is involved in 50% of cases
- d. retina antigen may be the provoking antigen
- e. enucleation after the other eye is attacked can halt the progress of the disease
- 9. Intraocular pressure:t
- a. varies seasonably
- b. varies diurnally and is highest in early morning
- c. drops promptly during onset of sleep and anaesthesia
- d. decreases with age in Caucasian
- e. varies with tachycardia
- 10. In tear film:
- a. Ig A is dominant and is formed in concentration about twice that of IgG
- b. IgA of tear contains a secretary piece of molecule
- c. lysozyme in human tear is greater than any other body fluid except saliva
- d. corneal injury produces an acidic tear film
- e. lysozyme concentration in tear is a useful diagnostic test for Sjogren's syndrome.
- 1. The following are true about sutures:
 - a. nylon breaks down in about half a year
 - b. vicryl is the synthetic absorbable suture made up of copolymer of glycolic acid and lactic acid
 - c. vicryl loses its tensile strength when absorption occurs
 - d. dexon gives wound support for up to 28 days and absorption is complete within 60-90 days
 - e. silk gives marked tissue reaction

- 2. Giant cell arteritis:
- a. cellular reaction directed against medial muscle cells and internal elastic membrane
- b. antinuclear antibodies titres often raised
- c. choroidal arteries seem to be completely exempted
- d. more male is affected than female
- e. occurs in majority of patients of polymyalgia rheumatica
- 3. Regarding penetrating keratoplasty:
- a. type II histocompatibility antigens present in the Langerhans cells in the cornea
- b. type I histocompatibility antigens expression is stronger in endothelial cells than epithelial cells
- c. persistent oedema promotes neovascularization
- d. recurrence of a herpetic keratitis in graft ulceration at last graft junction
- e. humoral factors are not important in graft rejection.
- 4. Prophylactic antibiotic is advised for patients with mitral valve disease undergoing:
- a. cataract surgery
- b. trabeculectomy
- c. dacryocystorhinotomy
- d. pterygium excision
- e. drainage of eyelid abscess
- 5. Myopic shift occurs in:
- a. nuclear sclerosis
- b. use of pilocarpine
- c. atropine instillation
- d. retro-orbital tumour
- e. use of topical beta-blocker
- 6. Regarding anatomy of the extraocular muscle:
- a. inferior oblique insertion is behind inferior rectus
- b. inferior rectus insertion is 6.5mm behind the limbus

c. the superior oblique muscle receives its motor nerve from its undersurfaced. vortex vein is found between the superior rectus and superior oblique angle

- e. in thyroid eye disease, the lateral rectus is the most commonly involved
- 7. Regarding pleomorphic adenoma of the lacrimal gland:
- a. it is a benign condition
- b. it causes downward and medial displacement of the globe
- c. it is covered by a true capsule
- d. pain is a prominent feature
- e. the lesion should be biopsied before excision is carried out to determine its nature
- 8. The following structures do not regenerate:
- a. corneal endothelium
- b. retinal pigment epithelium
- c. astrocytes
- d. Bowman's membrane
- e. ganglion cells
- 9. The following arise from the neural crest cells:
- a. corneal epithelium
- b. corneal endothelium
- c. uveal melanocytes
- d. retinal vessel endothelium
- e. retinal pigmented epithelium

10. Structures that contain fifth cranial nerve fibre include:

- a. otic ganglion
- b. geniculate ganglion
- c. trigeminal ganglion
- d. ciliary ganglion
- e. sphenopalatine ganglion

- 1. Retinal pigment epithelium is responsible for:
 - a. retinal attachment
 - b. storage of vitamin A
 - c. production of Bruch's membrane
 - d. absorption of ultraviolet light
 - e. the a-wave of electroretinogram
 - 2. Intraocular pressure:
 - a. varies seasonably
 - b. varies diurnally and is highest in early morning
 - c. drops promptly during the onset of sleep and anaesthesia
 - d. decreases with age in Caucasian
 - e. varies with tachycardia
 - 3. Pituitary stalk lesion is associated with:
 - a. severe diabetes mellitus
 - b. hypothyroidism
 - c. decreased secretion of luteinizing hormone
 - d. decreased prolactin secretion
 - e. low blood pressure
 - 4. Giant cells:
 - a. has phacocytic property
 - b. are made up of multi-nucleated aggregate of macrophage
 - c. are found in xanthogranuloma
 - d. occur in acute inflammation
 - e. are found in temporal arteritis
 - 5. Blinking reflex:
 - a. is the reflex to be abolished in general anaesthesia
 - b. is absent before 9 months of age
 - c. does not involved the visual cortex
 - d. requires normal trigeminal nerve function
 - e. is impaired in facial nerve palsy

- 6. Regarding the tear film:
- a. Ig A is dominant and is formed in concentration about 2X that of IgG
- b. Ig A of tear contains a secretary piece of molecule
- c. lysozyme in human tear is greater than any other body fluid except the saliva
- d. corneal injury produces an acidic tear film
- e. lysozyme concentration in Sjogren's syndrome is a useful diagnostic test
- 7. Regarding the cerebrospinal fluid:
- a. the normal volume is 20ml
- b. the normal pressure is 30mmHg
- c. it is formed mainly through ultrafiltration
- d. it surrounds the spinal cord as low as the second lumbar vertebrae
- e. oligoclonal Ig G band in the cerebrospinal fluid can be used to support the diagnosis of multiple sclerosis
- 8. The levator superioris muscle:
- a. arises from the lesser wing of the sphenoid
- b. is supplied by the superior branch of the oculomotor nerve
- c. is the longest muscle within the orbit
- d. becomes levator aponeurosis when it extends beyond the Whitnall ligament
- e. has the same embryologic origin as the superior rectus
- 9. In Horner's syndrome:
- a. the ptosis may be abolished with topical phenylepherine
- b. the intraocular pressure is decreased
- c. the conjunctival vessels become dilated
- d. 4% cocaine can dilate the pupil
- e. the reaction to light and accommodation is impaired
- 10. In miosis:
- a. occurs in long-standing Adie's pupil
- b. increases the depth of focus

- c. in the elderly is caused by a decrease in sympathetic outflow
- d. pin-point pupils caused by pontine infarction do not respond to light
- e. pupils are relatively miosed in during sleep
- 1. Craniopharyngioma:
 - a. arises from the pituitary gland
 - b. calcification is common
 - c. generally fast growing
 - d. majority presents before age 30
 - e. may cause compression of the optic chiasm
 - 2. The following are autosomal dominant:
 - a. myotonic dystrophica
 - b. Wyburn-Mason syndrome
 - c. Sturge-Weber syndrome
 - d. neurofibromatosis
 - e. keratoconus

3. Tetanus:

- a. is caused by an anaerobic bacillus
- b. has an incubation period of less than 48 hours
- c. results in life long immunity
- d. is associated with hypercatabolic state
- e. occurs only after major trauma
- 4. The neutrophil polymorph:
- a. originate in the bone marrow
- b. destroys bacteria predominantly by anaerobic mechanism
- c. show mitotic activity when engaged in inflammatory reaction
- d. is the effector cell in the destruction of virus
- e. is the characteristic cell of granulomatous inflammation

5. In relation to osmotic diuretic in treatment of glaucoma:

a. glycerol is a small size molecule, administered orally and is rapidly effective

b. mannitol has rapid action but poor ocular penetration

c. mannitol is rapidly excreted in the urine and may cause cerebrovascular accident

d. urea can be used as an osmotic diuretic in the treatment of glaucoma

e. mannitol must be warmed before use to dissolve crystals that may have formed

6. The following cell types have a phagocytic function:

- a. tissue histiocytes
- b. microglia
- c. small lymphocytes
- d. Kupffer cell
- e. neutrophil polymorphs
- 7. Chemotactic factors:
- a. increase directional leukocyte movement
- b. active macrophage
- c. decrease C3b receptors on phagocytes
- d. have a long half life
- e. interact with specific membrane receptor

8. The following are seen in healing after a clean surgical incision:

- a. regeneration of epithelium
- b. granulation tissue formation
- c. massive necrosis
- d. antibodies production locally
- e. migration of microglia.

9. The following statement(s) is/are correct:

a. sterilization implies the destruction or removal of pathogenic organism so as to render the object non-infective

b. boiling (1000C for 5 minutes) kills all vegetative organism and spores

c. the ultraviolet light produced artificially hs powerful germicidal propertiesd. halogen in very low concentration kill bacteria, virus, fungi and sporese. ether has little antibacterial properties.

10. Staphylococcus aureus:

a. lives as a commensal on the anterior nasal mucosa of 30-50% of general population

b. antibodies against staphylococcus aureus are present in the serum of all normal people

c. Staphylococcal food poisoning is due to consumption of preformed exotoxin in food

d. are coagulase-negative organisms

e. produce a heat labile nuclease.

1. Regarding immunoglobulins:

a. myeloma proteins representing each of the major classes of immunoglobulins and the 4 subclasses of immunoglobulins have been identified

b. IgA is the second most abundant class of immunoglobulins in the serum

- c. each contains 4 polypeptide chains
- d. IgG is the only immunoglobulins that crosses the human placental barrier
- e. rheumatoid factor is not an immunoglobulins

2. Fluid outflow pathways in a normal eye include:

- a. cilio-choroidal outflow
- b. choroido-vortex outflow
- c. uveo-scleral outflow
- d. trans-scleral outflow
- e. vitreoretino-choroidal outflow

3. The following drugs may cause benign intracranial hypertension:

- a. corticosteroids
- b. acetazolamide
- c. tetracycline

- d. vitamin A
- e. ethambutol
- 4. Echothiophate:
- a. its a cholinesterase inhibitor
- b. therapy may cause apnoea on succinylcholine administration
- c. concomitant phenylephrine drops minimize production of iris cysts
- d. causes cataract formation
- e. is used in treatment of lice infestation of lashes
- 5. Pterygo-palatine fossa contains:
- a. maxillary nerve
- b. pterygopalatine ganglion
- c. lesser superficial petrosal nerve
- d. nerve of pterygoid canal
- e. maxillary artery
- 6. Regarding SF6 gas:
- a. it is lipid soluble
- b. it can cause posterior subcapsular cataract
- c. it absorbs nitrogen from vein
- d. it will not expand with concentration of 40% SF6 and 60% air
- e. there is no electro-physiological evidence fo damage to photo-receptor

7. True statements regarding optic nerve:

a. the fibres of the optic nerve are the axons of the cells in the ganglionic layer of the retina

- b. the fibres of the optic nerve unmyelinated
- c. their sheaths are formed by Schwann cells
- d. it is comparable to a tract within the central nervous system
- e. it leaves the orbital cavity through the optic canal

8. Major problems associated with massive blood transfusions include;

- a. underlying coagulopathy
- b. thrombocytopaenia
- c. lack of coagulation faction V and VIII

d. hyperkalaemia

e. hypothermia

9. Blood supply of the orbit:

a. the principle arterial supply of the orbit and its structures derives from the ophthalmic artery

b. the ophthalmic artery is the second major branch of the intracranial portion of the internal carotid artery

c. the ophthalmic artery passes beneath the optic nerve and accompanies it through the optic canal into the orbit

d. the first intraorbital branch of the ophthalmic artery is the central retinal artery which enters the optic about 8-15 mm behind the globe.

e. other branches of the ophthalmic arteries include the long and short posterior ciliary arteries.

10. Concerning the para-nasal sinuses:

- a. the maxillary is well developed at birth
- b. the maxillary sinus is supplied by the intraorbital nerve
- c. the frontal sinus appears as a narrow slite at birth
- d. the sphenoidal sinus is supplied by the shenoidal nerve
- e. the middle the posterior ethmoidal air cells drains into the middle meatus.

1. The lacrimal gland:

a. is a mucous gland

b. is supplied by parasympathetic fibres after rely in the pterygopalatine ganglion

c. the palpebral part is the preferred site for biopsy

- d. is responsible for the most posterior layer of the tear film
- e. is made up of alveoli and two dozens ducts
- 2. The choroidal fissure:
- a. fuses at about seventh week of gestation
- b. failure to close can occur in association with cleft lip or palate
- c. closure starts most posteriorly and proceeds anteriorly till completion
- d. allows the exit of the hyaloid artery

e. coloboma can affect the iris, ciliary body, choroid, retina or optic nerve.

3. The ciliary ganglion:

a. lies on the medial aspect of the optic nerve

b. is one third of the way from the back of the eye to the apex

c. sympathetic fibres from the middle cervical ganglion passes through the ganglion without relay

d. parasympathetic fibres are carried to the ganglion in the nerve to the inferior oblique

e. most of the postganglionic fibres in the short ciliary nerves supply the muscle of the ciliary body for accommodation

4. The optic nerve:

a. in the orbit the anterior 1 cm is supplied by the central retinal artery

b. in the orbit the posterior 3 cm received a branch from the ophthalmic artery

c. the intracranial portion is supplied by the middle cerebral artery

d. the optic nerve travels through the optic canal with the ophthalmic artery superior and lateral to it.

e. meets the sclera at the posterior pole

5. Horner's syndrome:

a. marked ptosis

b. impaired reaction to light and accommodation

c. increased amplitude of accommodation

d. sweating on ipsilateral side of face if lesion is below the superior cervical ganglion

e. the pupil dilates with cocaine eyedrop

6. Concerning the ciliary ganglion:

- a. it is about 4 mm in diameter
- b. it is lateral to the optic nerve

c. its sensory root is a branch of the nasociliary nerve passes through the ganglion without relay and supply the whole eyeball except the conjunctiva

d. the majority of the postganglionic parasympathetic fibres from the

ganglion supply the sphincter muscle and cause pupillary constriction e. it gives rise to long ciliary nerve

7. Concerning the ophthalmic division of trigeminal nerve:

a. lacrimal branch supplies the skin of upper eyelid

b. infratrochlear nerve arises from the nasociliary nerve supply the lower lid

c. the frontal nerve passes forward beneath the roof of the orbit on the upper surface of the superior rectus muscle

d. nasociliary nerve is the largest branch fo the ophthalmic nerve

e. the lacrimal nerve contains sympathetic fibres to supply the lacrimal gland

8. Lens:

- a. stability of the lens protein depends on reduced sulfhydryl (SH) group
- b. ascorbic acid level is higher than the aqueous level
- c. glucose oxidized to sorbital in diabetic cataract
- d. do not absorb ultraviolet light
- e. most of the mitotic cells are in the anterior pole
- 9. Accommodation:
- a. pupil dilates during accommodation
- b. the anterior pole of the lens moves forward
- c. the lens sinks in the direction of gravity
- d. ciliary muscle pulls the choroid forward
- e. central region of anterior capsule of lens is thicker than peripheral

10. Visual pigment:

a. all-trans-retinaldehyde is isomerized to 11-cis-retinaldehyde when exposed to light

- b. peak absorption of rhodopsin is about 800nm
- c. retinoid is recycled within the photoreceptor cells
- d. most retinol exits in free form in blood
- e. uptake of retinol from blood depends on pigment epithelium.

1. Tear:

- a. rarely contains IgA
- b. newborn babies normally do not produce tears in the first day
- c. blinking is important in the transport of tears to puncta
- d. there is diurnal difference in lacrimal secretion
- e. production decreases with age

2. Ocular movement:

a. function of saccadic movement is to place object of interest on fovea rapidly

- b. velocity of saccadic movement can be up to 400 degrees per second
- c. smooth pursuit allow image of moving object to stay near fovea
- d. latency of saccadic movement is usually 200 millisecond
- e. the brain-stem reticular formation is associated with smooth pursuit

3. Tear film:

- a. contains a thin oily layer
- b. aqueous layer is 10um thick
- c. deficiency in conjunctival secretions could produce dry eye symptoms even aqueous tear is adequate
- d. 10-25% of the total tears secreted are lost by evaporation
- e. tear production decreases with timolol
- 4. Cornea:
- a. water content at a level of 75-80% of its weight
- b. drugs have to be water soluble to cross the epithelium rapidly
- c. transparent as a result of tightly and randomly packed fibrils
- d. capillaries extend into the cornea 1 or 2 mm beyond the limbus
- e. contains glycosaminoglycans
- 5. The intra-ocular pressure blood vessels:
- a. the pressure in the ophthalmic artery is about 100mmHg
- b. the choroidal and retinal capillaries lack precapillary sphincters
- c. the choroidal flow increases with any rise in intraocular pressure

d. complete obstruction fo the central retinal artery for more than one hour may lead to permanent total blindness

e. the eye receives all its blood from the internal carotid artery

6. Visual acuity:

a. for ordinary illuminations a pupil diameter of 2.3mm is the optimum

b. under photopic conditions, acuity deteriorates on passing from the retinal foveal to the periphery

c. under scotopic conditions acuity increases with progressive dark adaptation

d. T is generally easier letter to read than L

e. is not affected by the intelligence

7. Intraocular pressure:

- a. increases with age
- b. is not correlated with heart rate
- c. shows diurnal variation
- d. decreases during sleeping
- e. is not affected by general anaesthesia

8. The cornea:

a. contains 78% of water

b. enzymes of the tricarboxylic acid cycle are present in the corneal epithelium alone

- c. water can diffuse freely through the cornea in both directions
- d. mucopolysaccharides form 8% of the corneal dry weight
- e. keratin sulphate forms 25% of its dry weight
- 9. The saccadic system system:
- a. is generated in the occipital region
- b. has a latent period is about 400msec
- c. the velocity of movement is of the order of 350 degrees per second
- d. is depressed after taking sedatives
- e. is related to the activity in the reticular activating system

10. The following are true about accommodation:

a. the reaction time for the reflex to occur is about 0.15 seconds

b. the central zone fo the anterior surface of the lens becomes more convex

c. the stimulus to accommodation is a blurred retinal image

d. the range of accommodation is proportional to the amplitude of accommodation

e. the amplitude fo accommodation is about 5 dioptres at the age of 60

- 1. Diamox:
 - a. is excreted unchanged in urine
 - b. is concentrated in iris and ciliary epithelium
 - c. works in alkaline environment
 - d. crystallized in renal tubules
 - e. increases the respiratory rate

2. Systemic b-blocker:

- a. should be avoided in patients on verapamil
- b. decreases intraocular pressure
- c. increases the effect of potassium supplement
- d. can be given even if the patient is on topical b-blocker
- e. causes dry eye

3. Aqueous:

- a. has a lower sodium concentration in the anterior than posterior chamber
- b. has a refractive index of 1.336
- c. has a volume of about 1 ml in the anterior chamber
- d. supplements most of the nutrients to the corneal epithelium
- e. has an ascorbic acid concentration which is 5 times that of the serum
- 4. Regarding the photoreceptor outer segment:
- a. the cone pigments differ in opsin
- b. phagocytosis occurs only in the rod outer segment

- c. abnormal phagocytosis of RPE is a cause of some forms of retinitis pigmentosa
- d. phagocytosis of the rod outer segment is increased in darkness
- e. there are joined together by tight junctions
- 5. The following are known components of cataract:
- a. urate
- b. haemosiderosis
- c. oxalate crystals
- d. calcium phosphate
- e. creatinine crystals

6. Cholesterol crystals are found in:

- a. subretinal space in Coat's disease
- b. lipid keratopathy
- c. disciform macular degeneration
- d. lattice degeneration
- e. synchysis scintillans
- 7. Morphea basal cell carcinoma:
- a. is cystic
- b. has a later presentation than the nodular form
- c. has a higher recurrence rate after excision biopsy
- d. contains pallasading of cells
- e. contains fibrosis in the surrounding tissue
- 8. Optic chiasm:
- a. is anterior to the olfactory bulb
- b. in albinism has decrease crossing of fibres
- c. has a variable relationship to the pituitary gland
- d. supplied by anterior communicating artery
- e. forms part of the wall of the third ventricle
- 9. Regarding CMV virus:
- a. it is a RNA virus
- b. it belongs to the same family as Epstein-Barr virus

- c. it is sensitive to acyclovir
- d. it rarely caused retinitis in HIV patients with normal CD4+ counts
- e. it causes foetal abnormalities if the mother acquires the infection during pregnancy
- 10. The following are causes of hyperviscosity syndrome:
- a. iron deficiency anaemia
- b. multiple myeloma
- c. hyperlipidaemia
- d. sickle cell anaemia
- e. haemorrhagic shock
- 1. Herpes simplex:
 - a. herpetic keratitis is usually caused by type 1 herpes simplex
 - b. is a RNA virus
 - c. is sensitive to ganciclovir
 - d. causes congenital cataract
 - e. causes PORN (progressive outer retina necrosis)
 - 2. Subretinal fluid contains:
 - a. g-globulin
 - b. hyaluronic acid
 - c. fibrinogen
 - d. ascorbic acid
 - e. protein concentration is higher than the serum
 - 3. Regarding the ocular cardiac reflex:
 - a. the afferent is through the trigeminal nerve
 - b. it is mediated through the vagus nerve
 - c. it only occurs in children
 - d. it is suppressed by atropine
 - e. it is more common in retrobulbar than peribulbar anaesthesia
 - 4. The aetiologies of congenital cataract include:
 - a. toxoplasmosis
 - b. Refsum's disease
 - c. anirida

- d. thalassaemia
- e. congenital icthyosis
- 5. Chloroquine:
- a. is a slow acting anti-rheumatic drug
- b. is ototoxic
- c. its usual dosage is 200mg b.d.
- d. bull's eye maculopathy is reversible
- e. premaculopathy can be detected by visual field
- 6. The following arises from the neural crest:
- a. corneal stroma
- b. corneal endothelium
- c. uveal melanophore
- d. retinal vessel endothelium
- e. trabecular meshwork
- 7. The following are found in the lower pons:
- a. inferior salivatory nucleus
- b. inferior olivary nucleus
- c. facial nucleus
- d. abducent nucleus
- e. nucleus of descending spinal tract
- 8. Regarding the venous drainage of the eyeball:
- a. anterior ciliary artery drains into the anterior ciliary vein
- b. short posterior ciliary artery drains into the central retinal vein
- c. iris drains into vortex vein
- d. episcleral venous pressure is always negative
- e. choroidal venous pressure always greater than the intraocular pressure
- 9. Blood supply of the optic nerve include:
- a. branches of the central retinal artery
- b. branches of the long posterior ciliary artery
- c. main contribution from the central vessels of the optic nerve
- d. contributed by choroidal vessels
- e. branches of the pial vessels

- 10. b-blockers:
- a. are all lipid soluble
- b. universally decreases the heart rate
- c. prevents cathecholamine from acting on the receptors
- d. causes dry eyes
- e. increases uveoscleral outflow

Ophthalmology MCQs- Cornea

2. 1. The corneal epithelium is :

- a- Keratinized stratified squamous epithelium.
- b- Non keratinized stratified squamous epithelium.
- c- Tall columnar epithelium.
- d- Cuboidal epithelium.

2. One of these factors contributes to corneal transparency:

- a- Regular arrangement of stromal collagen fibrils.
- b- Intact epithelium and endothelium.
- c- Normal I.O.P.
- d- All of above.

3. Endothelial cell layer of the cornea are examined by :

- a- Ophthalmoscope.
- b- Gonioscope.
- c- Specular microscope.
- d- Skiascopy.

4. Corneal diameter is measured by:

- a- Slit lamp.
- b- Caliper & Ruler.
- c- Keratometry.
- d-Retinoscopy.

5. Corneal thickness is measured by:

- a- Pachymetry.
- b- Biometry.
- c- Keratometry.
- d- Perimetry.

6. Corneal power and curvature is measured by:

- a- Topography.
- b- Keratometry.
- c- Slit lamp biomicroscopy.

d-Both A & B.

7. Only one organism of the following can invade normal corneal epithelium :

- a- Psuedomonas.
- b- Gonococcus.
- c- Staphylococcus.
- d- Pneumococcus.

8. Healing of corneal ulcer results into an opacity because:

- a- New fibres are not regularly arranged.
- b- B.M is not regenerated.
- c- None of above.
- d- All of above.

9. The type of corneal opacity that affects vision more is :

- a- Diffuse nebula.
- b- Diffuse macula.
- c- Dense leucoma.
- d-None of them.

10. Pseudo - cornea is formed of:

- a- All corneal layers.
- b- Three layers namely epithelium, stroma & endothelium.
- c- Stromal layer with epithelium.
- d- Only epithelial layer.

11. The followings are true about hypopyon except:

- a- It is leucocytosis due to bacterial toxins.
- b- It is fluid & cells.
- c- It is absorbed with therapy.
- d- It is infected fluid containing pus cells.

12. Ulcer serpens is caused by :

- a- Staphylococci.
- b- Streptococci.
- c- Pneumocucci.
- d- Gonococci.

13. Steroids are indicated topically in :

- a- Hypopyon ulcer.
- b- Dendritic ulcer.
- c- Mycotic ulcer.
- d- Disciform keratitis.

14. Mooren's ulcer is :

- a- Degenerative ulcer.
- b- Infective ulcer.
- c- Auto immune ulcer.
- d- Neuroparalytic ulcer.

15. The reservoir of infection in herpes zoster ophthalmicus is:

- a- Ciliary ganglion. '
- b- Gasserian ganglion;
- c- Superior cervical ganglion.
- d-Inferior cervical ganglion.

16. Fleischer's ring on the corneal epithelium is seen in :

- a- Keratoglobas.
- b- Keratoconus.
- c- Keratomalacia.
- d- Anterior staphyloma.

17. In advanced keratoconus, the best treatment is :

- a- Penetrating keratoplasty.
- b- Soft Contact lenses.
- c- Hard contact lenses.
- d- Refractive surgery.

18. In recurrent neuroparalytic keratitis the best treatment is :

- a- Antibiotic drops & ointment..
- b- Artificial tears.
- c- Tarsorrhaphy.
- d- Closure of lacrimal puncta.

19. Small peripheral corneal perforation leads to:

- a- Corneal fistula.
- b- Anterior polar cataract.
- c- Peripheral anterior synechia.
- d-Anterior staphyloma.

20. A patient with corneal ulcer noticed sudden cessation of pain & relieve of other symptoms. The possible occurrence is:

- a- Complete cure.
- b-Perforation.
- c- Endophthalmitis.
- d- Corneal fistula.

MCQS: Accommodation and Near Vision

- 1. Which patient would not benefit from an effort to control his accommodation during the refraction process?
- A. 6 year old myope
- B. 60 year old hyperope
- C. 65 year old pseudophake
- D. 40 year old emmetrope
- E. all would benefit
- 2. During refractometry, uncontrolled accommodation may result in:
- A. an over-corrected myope
- B. an under-corrected hyperope
- C. an unbalanced correction
- D. all of the above

3. Which of these methods can be used to control accommodation?

- A. fogging
- B. cycloplegia
- C. cross-cylinder refinement
- D. A and B
- E. A and C
- 4. Which of these drops is not a cycloplegic?
- A. cyclopentolate
- B. phenylephrine
- C. tropicamide
- D. atropine
- E. all are cycloplegics
- 5. Which is true of fogging?
- A. plus sphere corrections are increased
- B. minus sphere corrections are reduced
- C. the fogged patient gets blurrier when accommodating
- D. all are true

6. Which 50 year old would be able to read without glasses? (distance correction is given)

- A. -2.00 sph
- B. -0.50 sph
- C. plano
- D. +0.50 sph
- E. +2.00 sph

7. Which factor would not benefit a patient's reading ability?

- A. bright lighting
- B. large print size
- C. large pupil size
- D. contact lenses for a hyperope
- E. all would be beneficial

8. You might expect a 45 year old to have an add power of:

- A. +3.25
- B. +2.75
- C. +1.25
- D. +2.00
- E. +0.50

9. You might expect a 50 year old to have an add power of:

- A. +3.25
- B. +2.75
- C. +1.00
- D. +1.75
- E. +0.50

10. When determining a patient's add power, you should:

- A. start with the patient's present add power
- B. start with a high add power and work lower
- C. start with a low add power and work higher
- D. take the add power from a table
- E. add .50 D to the patient's present add power

11. Most patients will need ______ when converting from a flat-top bifocal to a progressive bifocal.

- A. the same add power
- B. a slightly weaker add power

C. a slightly stronger add power

D. bigger frames

E. smaller frames

12. The add power in the middle seg of a flat-top trifocal is usually:

A. half of the strength of the reading add

B. two times the strength of the reading add

C. one quarter of the strength of the reading add

D. one third of the strength of the reading add

E. three times the strength of the reading add

13. Mr. Smith has a +1.50 distance correction OU and a +2.00 add. A pair of music glasses focusing at arms-length would probably read:

A. +5.50 OU B. +3.50 OU

C. +2.50 OU

D. +2.00 OU

E. +1.50 OU

14. Mrs. Brown's refraction is -0.50 OU with a +2.50 add. She is always misplacing her glasses. An inexpensive choice for music glasses would be:

A. executive bifocals

B. executive trifocals

C. progressives

D. flat-top trifocals

E. +1.00 half glasses

15. Mr. Clark's refraction is +0.75 OU with a +2.00 add. He would like bifocals to use with his computer that have intermediate strength in the top and reading power in the seg. His prescription would read:

A. +0.75 OU, add +2.00 B. +1.75 OU, add +1.00 C. +1.00 OU, add +1.75 D. plano OU, add +2.25 E. -0.75 OU, add +2.00

Clinical mcq on management of bleeding

A 70-year-old man presents unconscious to the Accident and Emergency Department. He had been found by the warden at his sheltered accommodation, who brought in his medications: warfarin, furosemide and amoxycillin (10-day course, 5 days used). Examination showed a Glasgow coma scale of 5/15, a dilated left-sided pupil and right-sided upper motor neurone signs in the upper and lower limbs. A computed tomography scan of the brain shows a large left-sided subdural haematoma. Ten mg intravenous vitamin K was given immediately.

Blood tests are shown below: haemoglobin (HB) 9.5 g/dl white cell count (WCC) 5.3 x 109/l platelets 403 x 109/l activated partial thromboplastin time (APTT) 43 s (30–40s) international normalized ratio 7.0 (target INR 2.5)

What is the best management for his acquired bleeding tendency?

Prothrombin complex concentrate 50 U/kg
 Fresh frozen plasma 15 ml/kg stat
 Factor VIII bypassing agent (FEIBA)
 Ten units of cryoprecipitate
 Fifty U/kg of recombinant activated factor VII

MCQS IN OCULAR MOTILITY - COVER TESTS

- 1. An eye deviation that is present all the time is called a:
- A. phoria
- B. tropia
- C. hyper deviation
- D. eso deviation
- E. exo deviation

2. An eye alignment deviation that is not present unless fusion is disrupted is called a:

- A. phoria
- B. tropia
- C. hyper deviation
- D. eso deviation
- E. exo deviation

3. An eye deviation that involves one eye turning out is termed a(n):

- A. hyper deviation
- B. eso deviation
- C. exo deviation
- D. interior deviation
- E. exterior deviation

4. An eye deviation that involves one eye turning up is termed a(n):

- A. hyper deviation
- B. eso deviation
- C. exo deviation
- D. interior deviation
- E. exterior deviation

5. When performing the Cover Test, the left eye is covered with the occluder, then:

A. the occluder is immediately moved to the right eye

B. the left eye remains covered for 5 minutes

- C. the left eye is observed as the cover is removed
- D. the right eye is observed at the same time
- E. any of the above

6. When performing the Cover Test, if the right eye is covered and the left eye is observed to move in a downward direction from an upward position, then a _____ exists.

- A. RXT
- B. LET
- C. RHT
- D. LHT
- E. RET

7. When performing the Uncover Test, the occluder is removed from the right eye. The next step is to:

- A. move the occluder to the left eye
- B. place the occluder over the right eye again
- C. observe the right eye for any movement
- D. observe the left eye for any movement
- E. check the patient's vision

8. When the cover is removed from the left eye of a patient who has a phoria, both eyes regain fixation because the patient:

- A. gets nauseated
- B. has double vision
- C. has blurry vision
- D. has nothing better to do
- E. wants to go home

9. When performing the Uncover Test, we observe that the right eye moves outward from an inward position to pick up fixation, indicating the presence of a(n):

- A esophoria
- B. exophoria
- C. right esotropia
- D. left exotropia
- E. hypophoria

10. When performing the Cover-Uncover Test, which step tests for the presence of a tropia of the right eye?

- A. observe the right eye as the left is covered
- B. observe the right eye as the right is covered
- C. observe the left eye as the right is covered
- D. observe the left eye as the left is covered
- E. none of the above

11. The "cover" part of the Cover-Uncover procedure tests for a ______, and the "uncover" part of the procedure tests for a _____.

- A. right tropia, left tropia
- B. horizontal deviation, vertical deviation
- C. phoria, tropia

D. tropia, phoria E. esophoria, exophoria 12. When performing the Cover-Uncover Test, the right eye is observed to move in an outward direction from an inward position as the left eye is covered. This indicates the presence of a(n): A. RHT

B. RXT

C. RET

D. LXT

E. LET

13. When performing the Cover-Uncover Test, the left eye is uncovered and is observed to pick up fixation by moving in an inward direction from an outward position. This indicates the presence of a(n).

A. esophoria

B. exophoria

C. esotropia

D. exotropia

E. L exotropia

14. Which step(s) is (are) part of the Alternate Cover Test procedure?

A. cover the right eye and observe the left eye

B. cover the left eye and observe the right eye

C. move the cover quickly from one eye to the other

D. observe each eye as it is being uncovered

E. C and D

15. When performing the Alternate Cover Test, you observe each eye moving in an outward direction from an inward position as it is being uncovered, indicating the presence of a(n):

A. nystagmus

B. hypo deviation

C. hyper deviation

D. exo deviation

E. eso deviation