Certified Ophthalmic Assistant Practice Exam (Sample)

Study Guide

Everything you need from our exam experts!

Questions

1. Degermation of the hands is known as

A. Antisepsis

B. Rubbing

C. Scrubbing

D. Sterilization

2. How do you assess light projection in a patient?

A. Use a keratometer

B. Check pupil response

C. Shine a light in 4 quadrants and ask the patient to point to the direction of the light source

D. Check intraocular pressure

3. What part of the rules for transposition involves changing the axis of the cylinder?

A. 45 degrees

B. 60 degrees

C. 75 degrees

D. 90 degrees

4. Which of the following glands secrete oil in the eyelids?

A. Conjunctival glands

B. Meibomian glands

C. Sweat glands

D. Zygomatic glands

5. What is the best way to guide a partially-sighted patient to an exam room?

A. Using a wheelchair

B. Providing a walking stick

C. Using audible directions

D. Offering your arm

6. Which drug is a powerful mydriatic and cycloplegic that can take up to two weeks to wear off?

A. Atropine

B. Cyclopentolate

C. Homatropine

D. Tropicamide

7. Soft contact lenses are susceptible to deposits of

A. Proteins

B. Residues

C. Bacteria

D. Xenobiotics

8. What is the spherical equivalent of +2.00 +5.00 X 180?

A. +3.50

B. +4.50

C. +5.50

D. +6.50

9. The instrument that measures the curvature of the central part of the cornea is the

A. Keratometer

B. Lensmeter

C. Phoropter

D. Ophthalmoscope

10. A hemorrhage that partially fills the anterior chamber with blood is called

A. Hyphema

B. Ptosis

C. Pterygium

D. Drusen

Answers

1. C
2. C
3. D
4. B
5. D
6. A
7. A
8. B
9. A
10. A

Explanations

1. Degermation of the hands is known as

A. Antisepsis

B. Rubbing

C. Scrubbing

D. Sterilization

Degermation of the hands is known as scrubbing. Scrubbing refers to the process of thoroughly washing the hands with soap and water to remove dirt, debris, and germs. This is a crucial step in infection control and hygiene practices, especially in healthcare settings where maintaining clean hands is essential to prevent the spread of infections. Antisepsis refers to the process of inhibiting or preventing the growth of microorganisms on living tissue. Rubbing, although a form of mechanical action, is not specific to the degermation of hands. Sterilization involves the complete destruction or elimination of all forms of microbial life, including spores, and is usually done on inanimate objects rather than hands.

2. How do you assess light projection in a patient?

A. Use a keratometer

B. Check pupil response

C. Shine a light in 4 quadrants and ask the patient to point to the direction of the light source

D. Check intraocular pressure

Assessing light projection in a patient involves shining a light in different quadrants and asking the patient to point in the direction of the light source. Option A, using a keratometer, is used for measuring corneal curvature and not light projection. Option B, checking pupil response, is used to assess the function of the pupil and its response to light, but it is not specifically used for assessing light projection. Option D, checking intraocular pressure, is used to measure the fluid pressure inside the eye and is not directly related to assessing light projection in a patient. Therefore, option C is the correct answer for this question.

3. What part of the rules for transposition involves changing the axis of the cylinder?

A. 45 degrees

B. 60 degrees

C. 75 degrees

D. 90 degrees

Transposition in optometry involves converting a prescription from a negative cylinder form to a positive cylinder form, or vice versa. When changing the axis of the cylinder, the rule is to add 90 degrees to the original axis if converting from a minus cylinder to a plus cylinder, or subtract 90 degrees if converting from a plus cylinder to a minus cylinder. Therefore, the correct answer is D - 90 degrees. In this context, the other options are incorrect because they do not align with the standard rule for changing the axis of the cylinder during transposition.

4. Which of the following glands secrete oil in the eyelids?

A. Conjunctival glands

B. Meibomian glands

C. Sweat glands

D. Zygomatic glands

The correct answer is B. Meibomian glands. Meibomian glands are located within the eyelids and secrete an oily substance that helps prevent the evaporation of tears and maintains the tear film on the surface of the eye. This oil also helps prevent tears from overflowing onto the cheeks. Conjunctival glands (choice A) secrete mucus to lubricate the surface of the eye, sweat glands (choice C) produce sweat to regulate body temperature, and zygomatic glands (choice D) are responsible for producing saliva, not oil in the eyelids.

5. What is the best way to guide a partially-sighted patient to an exam room?

A. Using a wheelchair

B. Providing a walking stick

C. Using audible directions

D. Offering your arm

Guiding a partially-sighted patient to an exam room by offering your arm is the best choice among the options provided. Offering your arm allows the patient to physically connect with you, providing a stable and secure means of guidance. It also allows you to lead the patient effectively, ensuring their safety as they navigate to the exam room. Using a wheelchair might not be necessary for a partially-sighted patient who is capable of walking, as it could reduce their independence and mobility. Providing a walking stick could be helpful, but it might not offer the same level of guidance and support as offering your arm. Using audible directions might be confusing or disorienting for a partially-sighted patient, as they rely more on physical assistance and guidance in unfamiliar environments.

6. Which drug is a powerful mydriatic and cycloplegic that can take up to two weeks to wear off?

A. Atropine

B. Cyclopentolate

C. Homatropine

D. Tropicamide

Atropine is a powerful mydriatic and cycloplegic drug that can take up to two weeks to wear off. It is commonly used for conditions such as uveitis, iritis, and amblyopia. Atropine works by dilating the pupil (mydriasis) and relaxing the ciliary muscle of the eye (cycloplegia), which temporarily paralyzes the ability of the eye to focus. This prolonged effect makes it particularly useful in certain eye conditions where long-lasting pupil dilation and cycloplegia are beneficial. The other options, Cyclopentolate, Homatropine, and Tropicamide, are also commonly used as mydriatics and cycloplegics in ophthalmic practice, but they do not have the same duration of action as Atropine. Cyclopentolate typically lasts around 6-24 hours, Homatropine lasts about 24-72 hours, and Tropicamide has a shorter duration of action, usually around 4-8 hours.

7. Soft contact lenses are susceptible to deposits of

A. Proteins

B. Residues

C. Bacteria

D. Xenobiotics

Soft contact lenses are made of hydrophilic materials that attract and hold on to proteins found in tear film. This protein build-up can cause discomfort, blurred vision, and increase the risk of eye infections. Residues, such as cosmetics, can also accumulate on lenses and lead to irritation or damage. Bacteria, commonly found in the eyes, can grow on the surface of contact lenses and potentially cause infections if not properly cleaned and maintained. Xenobiotics, which are foreign substances in the body, can also adhere to contact lenses, but are not as commonly seen as protein and residue build-up. Hence, these three choices are incorrect as they are not the primary causes of deposits on soft contact lenses compared to proteins.

8. What is the spherical equivalent of +2.00 +5.00 X 180?

A. +3.50

B. +4.50

C. +5.50

D. +6.50

The spherical equivalent is calculated by combining the spherical power with half of the cylindrical power. In this case, the spherical power is +2.00, and the cylindrical power is +5.00 at axis 180 degrees. So, the calculation would be: +2.00 + (+5.00/2) = +2.00 + (+2.50) = +4.50 Therefore, the spherical equivalent for +2.00 +5.00 X 180 is +4.50, which corresponds to option B.

9. The instrument that measures the curvature of the central part of the cornea is the

A. Keratometer

B. Lensmeter

C. Phoropter

D. Ophthalmoscope

The keratometer is the instrument most commonly used by optometrists and ophthalmologists to measure the curvature of the cornea, which is the clear, dome-shaped surface that covers the front of the eye. This measurement is important in determining the proper fit for contact lenses and diagnosing certain eye conditions. Option B, the Lensmeter, is used to measure the power and prescription of glasses lenses, not the curvature of the cornea. Option C, the Phoropter, is used to determine an individual's refractive error and determine the right prescription for glasses or contact lenses, but it does not directly measure the curvature of the cornea. Option D, the Ophthalmoscope, is used to examine the internal structures of the eye, such as the retina and optic nerve, and is not used to measure the curvature of the cornea.

10. A hemorrhage that partially fills the anterior chamber with blood is called

A. Hyphema

B. Ptosis

C. Pterygium

D. Drusen

A hemorrhage that partially fills the anterior chamber with blood is called a hyphema. A hyphema is typically caused by trauma to the eye, resulting in bleeding inside the front part of the eye. This condition can be serious and requires immediate medical attention to prevent complications such as increased eye pressure and potential vision loss. Ptosis refers to drooping of the upper eyelid, pterygium is a growth of pink, fleshy tissue on the conjunctiva, and Drusen are yellow deposits under the retina. These conditions are not related to bleeding in the anterior chamber of the eye, making them incorrect choices in this case.