



SNS COLLEGE OF NURSING
Saravanam Patti (po), Coimbatore.



DEPARTMENT OF NURSING

COURSE NAME : B.Sc. (Nursing) II Year.

SUBJECT : MEDICAL SURGICAL NURSING II

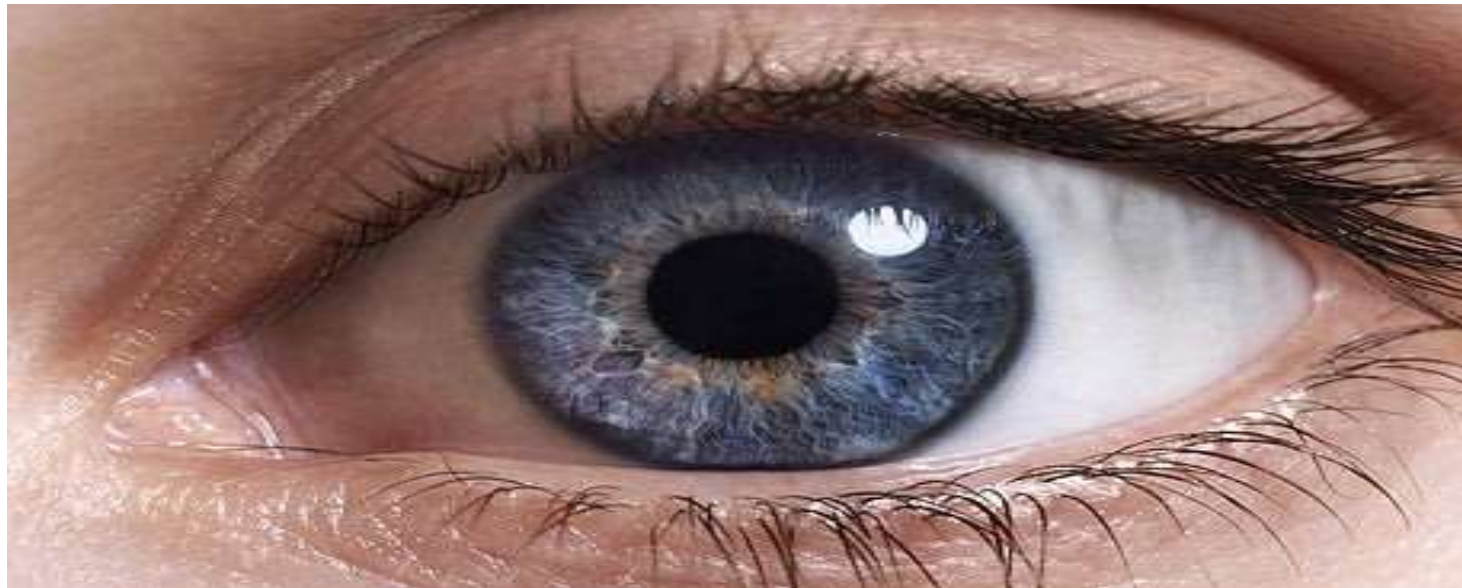
UNIT : II- EYE DISORDERS

TOPIC : INTRODUCTION TO EYE STRUCTURE



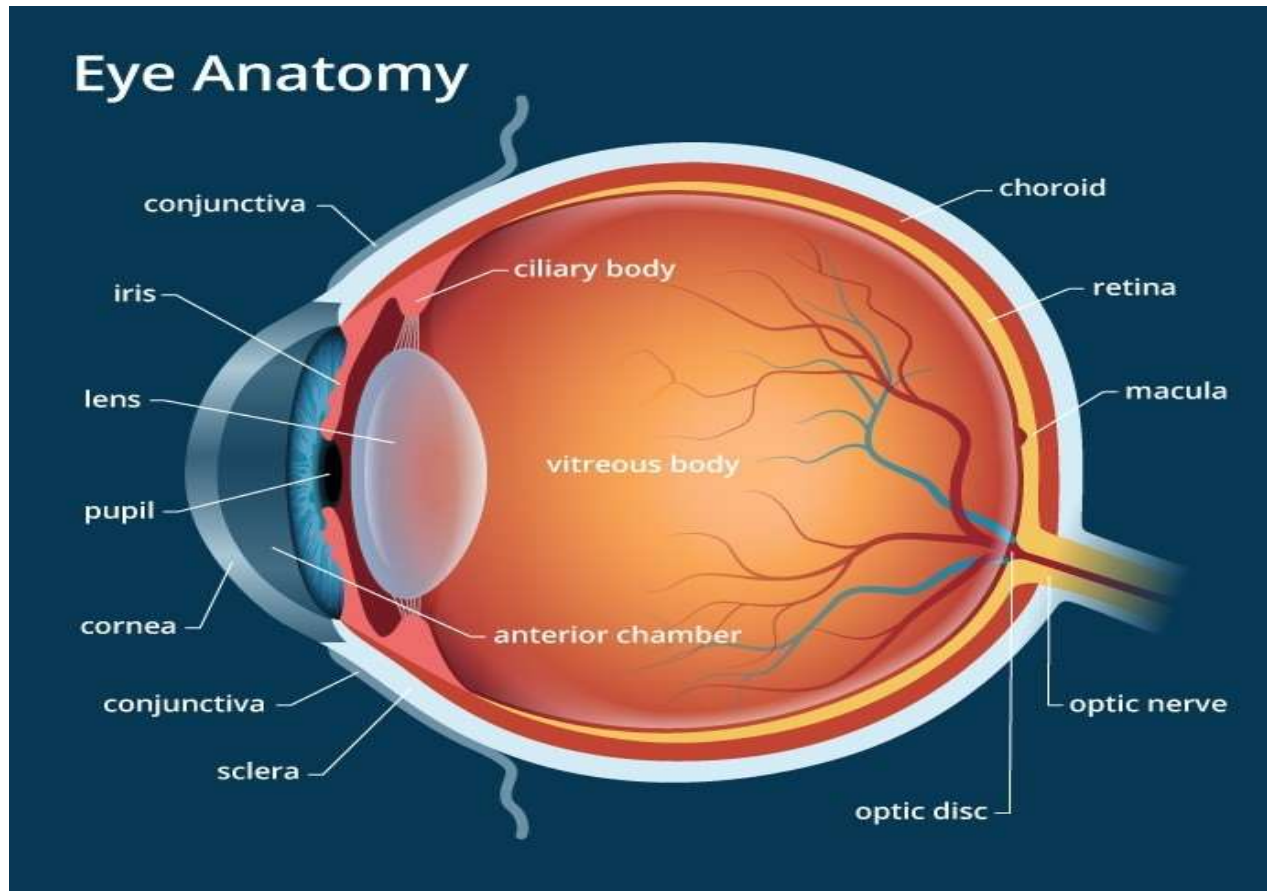
STRUCTURE AND FUNCTION OF THE EYE

- ▶ The human eye is an organ which reacts to light and pressure. As a sense organ, the mammalian eye allows vision. A Normal Eye looks like,





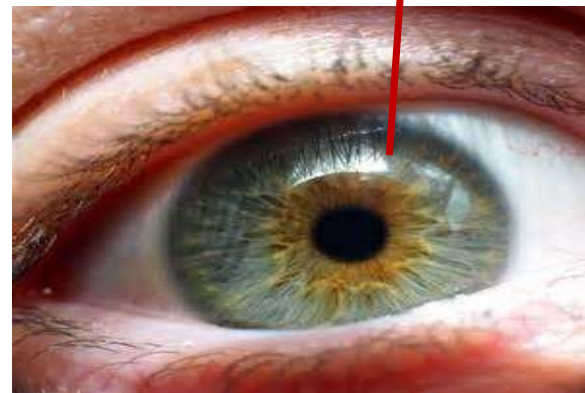
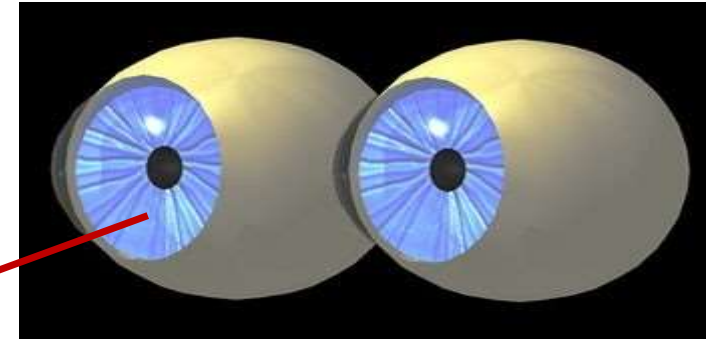
- ▶ **The front part of the Eye includes:**
- ▶ Iris: the colored part.
- ▶ Cornea: a clear dome over the iris.
- ▶ Pupil: the black circular opening in the iris that lets light in.
- ▶ Sclera: the white of your eye.



IRIS

(colored part)

- Colored part of eye
- Controls light entering

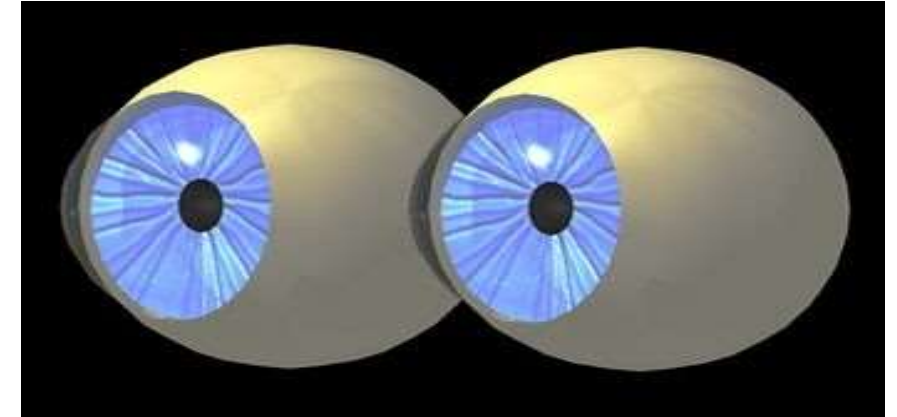


Function:
Controls the amount of light entering the eye

CORNEA

(clear lens in front of eye)

- transparent covering of the front of the eye
- Allows for the passage of light into the eye and functions as a fixed lens.

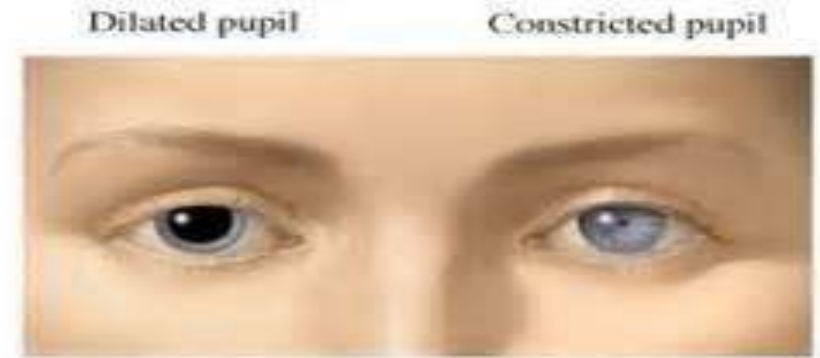
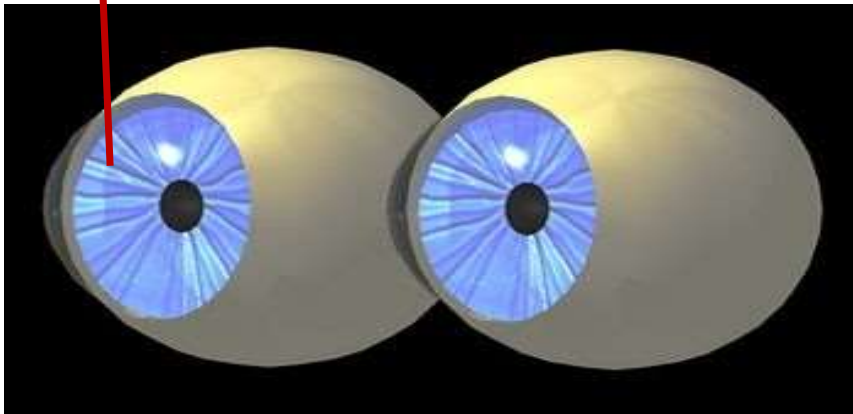


Function:

Allows for the passage of light into the eye and it also focuses the light.

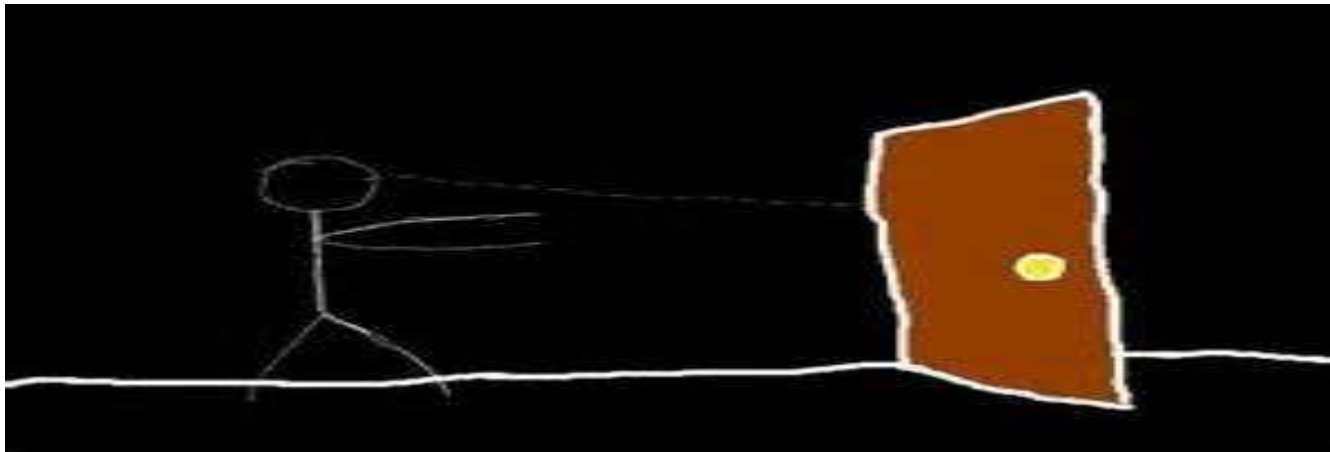
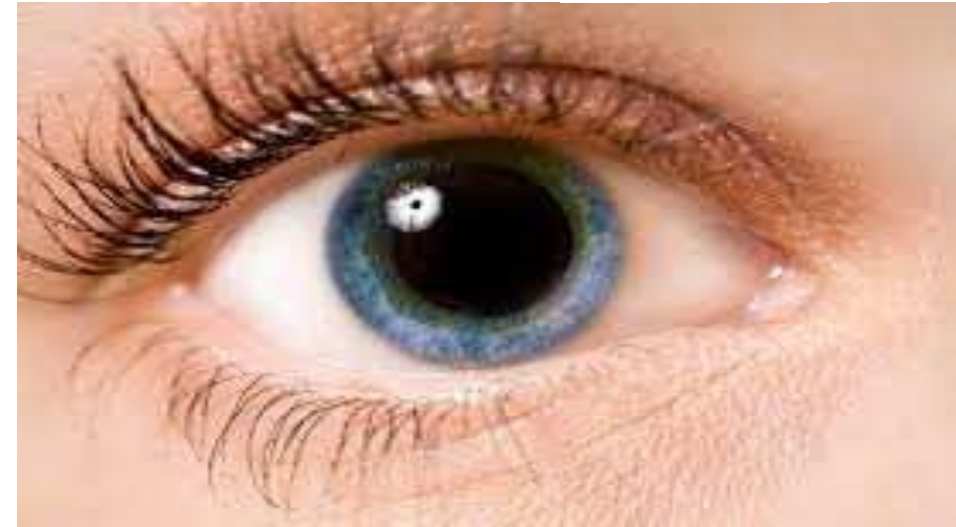
PUPIL (*black hole*)

- black hole in iris
- where light enters



Function:
Pupil size is controlled by iris muscles

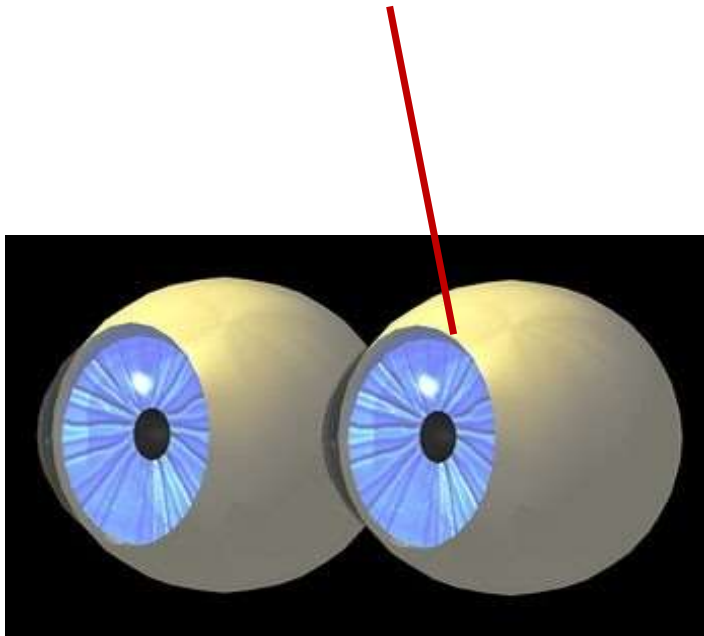
When the eye needs **more light** to enter (when it is dark), **the pupils get larger**; allowing more light to enter the eye



When the eye needs **less light** to enter (when it is very bright), **the pupils get smaller**; allowing less light to enter the eye.

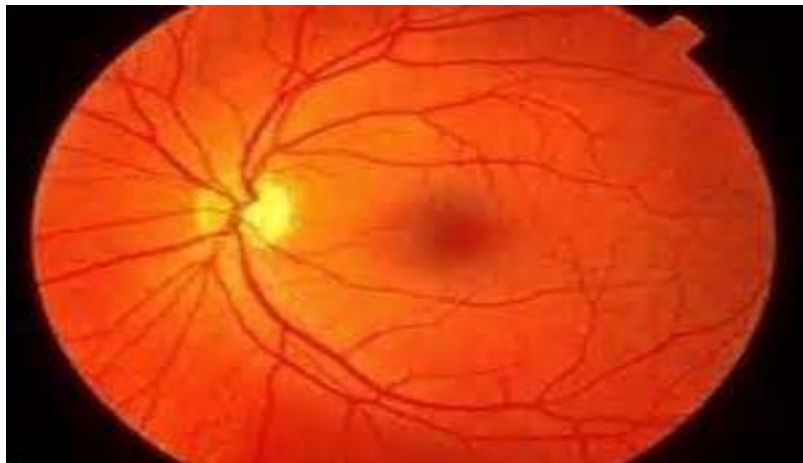
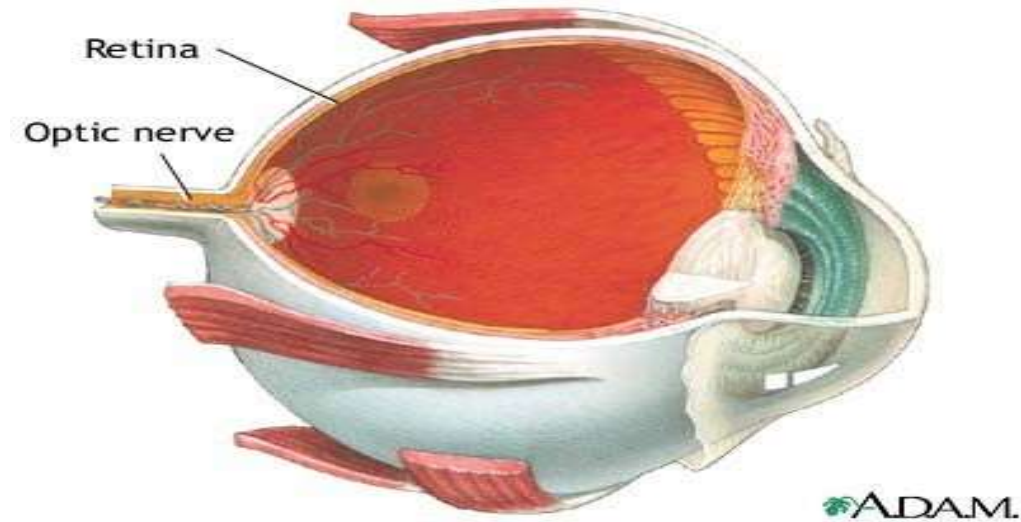


SCLERA – a tough white skin (made of tissue) that covers all of the eyeball except the cornea.



Function:
Supports eyeball and provides attachment for muscles

- Internal membrane
- Contains light-receptive cells (rods and cones)
- Converts light to electrical signals



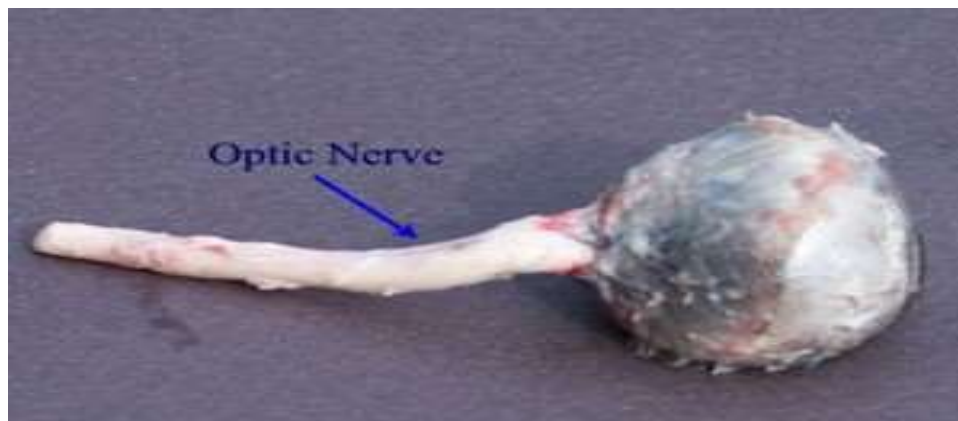
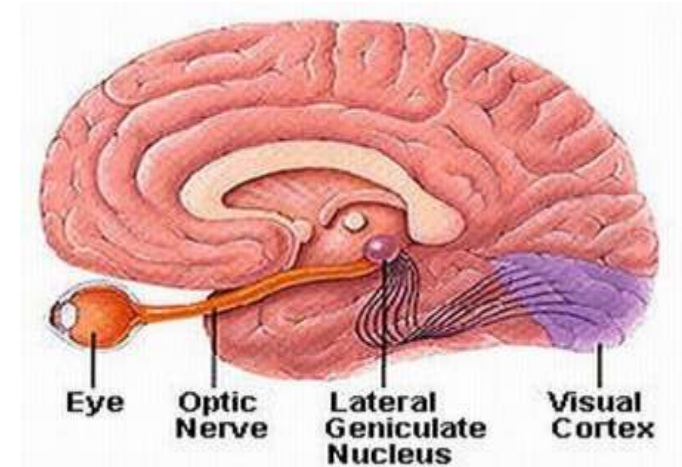
Function:
Converts light waves to electrical signals

OPTIC NERVE

Transmits electrical impulses from retina to the brain

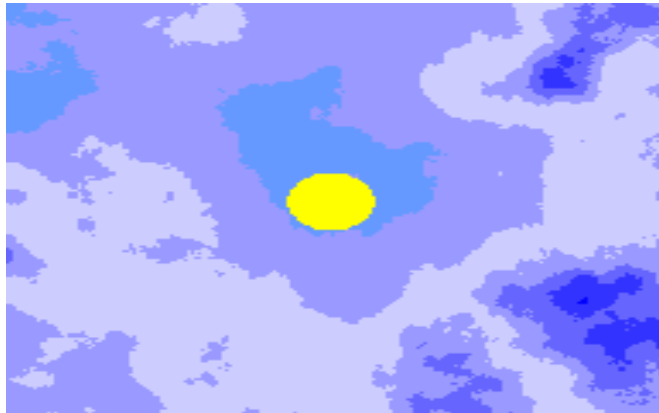
Creates blind spot

Brain takes inverted image and flips it so we can see



Function:

Transmits electrical signals from retina to the brain



1 2 3 4 5 6

Close your right eye and look directly at the number 3. Can you see the yellow spot in your peripheral vision? Now slowly move towards or away from the screen. At some point, the yellow spot will disappear.



- ▶ The eye has many parts that must work together to produce clear vision:
- ▶ The sclera, or white part of the eye, protects the eyeball.
- ▶ The pupil, or black dot at the center of the eye, is a hole through which light can enter the eye.
- ▶ The iris, or colored part of the eye, surrounds the pupil.



- ▶ Main function is the protection of the eye.
- ▶ They also help to distribute tears which wash and lubricate the eyes.



ASSESSMENT

1. What is blind spot?
2. What is the normal diameter of the pupil?
3. What is function of sclera?



***EVERY ENDING
IS REALLY JUST A
NEW BEGINNING***



THANK YOU