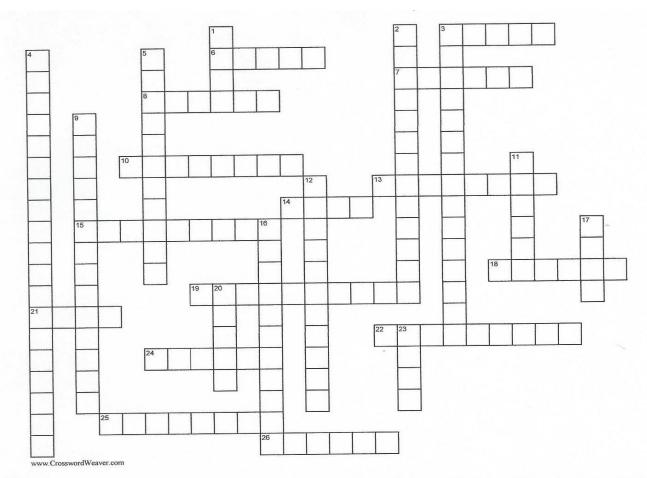
Investigation 3.12B

The Eye

P. Date:

Crossword 3.12B

Directions: Use the highlighted terms in the chapter to solve the puzzle. Most clues come from the chapter text, but some require outside investigation. Omit spaces or dashes between words.



ACROSS

- 3 photoreceptor cells responsible for color vision; work best in bright light conditions
- 6 eye surgery to cornea correcting myopia, hyperopia, and astigmatism
- 7 the first point of light beam eye contact
- 8 the white outer layer of the eyeball; continuous with the cornea at the front of the eye
- 10 disease of the optic nerve cuased by excessively high pressure of the fluid insie the eye
- 13 a progressive clouding of the lens; eye gradually loses its ability to focus light toward the retina. Correctible with surgery
- 14 photoreceptor cells concentrated at the peripheral edges of the retina; work best in low light conditions
- 15 far-sightedness; the light beam is not yet in focus when it reaches the retina
- 18 near-sightedness; the light beam is in focus before it reaches the retina
- 19 sends electrical impulses from optic disc to the halamus and then occipital lobe of the brain
- 21 our organs of vision
- 22 the portion of the retina where the optic nerve attaches at the optic disc
- 24 the movie screen of the eye; the image is upside down

- 25 lens of glasses that have two corrections; one for near visiion and one for distance vision
- 26 the portion of the retina having the greatest acuity

DOWN

- 1 the least common eye color; requires double recessive gene traits
- 2 the area of the brain that processes image signals from the optic nerves; flips the retinal image to right-side-up
- 3 a scratch on the eye cornea
- 4 progressive degeneration of the macula within the retina
- 5 the entire area the eyes can see without moving the eyes
- 9 medical eye emergency; can result in permanent loss of vision
- 11 clearness of vision
- 12 the membrane overing the front of the eye and lines the inside of the eyelids
- 16 an imperfection in the shape of the eye affecting how the eye focuses light; correctable with glasses or surgery
- 17 the pigmented, or colored part of the eye
- 20 the open space in the middle of the iris through which light passes on its way to the retina
- 23 hopefully bends light in the eye such that it focuses at a single point on the retina

Dr._____