THOUGHTS ON VISION

by Martha Eddy

The percentage of U.S. children wearing glasses for nearsightedness advances from 4% to 20% between fifth and eighth grades, up to 40% for high school seniors, and continuing to 60-80% for college students (the highest being among honors students). A healthy flexibility between near and distant sight is inhibited by the tremendous amount of reading and writing required in the process of becoming educated. This trend is further exaggerated as both recreational and work time are consumed by the use of Video Display Terminals in schools, homes, game halls, and places of employment. Yet, by simply including exercises for our eyes, especially in our movement activities, we can maintain a full visual range.

Kids' natural flexibility and yearning for diversity and movement make them ready for and receptive to the care of their eyes. As parents and movement teachers, we can easily incorporate visual training into our play with children. Simply apply the same guidelines appropriate for any mobile part of the body to the eyes as well. For instance, isolate the movement of the eyes using all qualities of movement: sustained stretching, quick shifts, loose swings. Then integrate the eyes with the whole body movements like beginning a spinal twist with the eyes leading, or having the eyes follow the fingers through space. Play with the eyes just as you would with any part of the body or the body as a whole.

In order to design activities that serve the eyes more specifically, it is helpful to be familiar with the basic components of vision:

- focusing—choosing a point of attention that defines the foreground, thereby separating background and foreground.
- accommodation—shifting of focus between far vision and close vision.
- tracking—locating an object and following it smoothly as it moves through space.
- integration—focusing while tracking.
- binocular fusion—coordinating the 2 eyes so that they focus on the same point.
- stereopsis—the perception of three dimensions, an outgrowth of binocular fusion.
- peripheral vision—awareness of what is in the volume of space around that which is being focused on directly.
- perceptual skills—comprehending and interpreting visual forms, and knowing where we are in relation to what we see.
- eye/body coordination—the ability to move the whole body in a specific pattern or pathway through space.
- eye/hand coordination—being able to draw or accomplish other visually determined tasks with the hands.
- visualization—practicing in the mind's eye how to act and move, recreating visual experiences and imagery.
- perceptual flexibility—the ability to accept another person's visual interpretation, their point of view.

Seeing includes most of these components in any one instance. Different people will utilize them in unique ways, depending primarily upon the physical condition of their eyes, how they've learned to see, and how they are feeling. As a whole system, seeing is, ideally, a relaxed process activated by an often unperceived decision to receive the light that is reflected off an area of interest. Eye activities rekindle our motivation to be visually alert, and can also serve to bring the various visual skills into balance.

The following are some ideas for practicing these skills at home, in school or in movement classes. They are designed with school-age children in mind but certainly are useful and fun for adults too.

RELAXATION

1. Encourage short breaks between activities, especially writing, reading, TV, drawing, etc. Look up at the most distant interesting view, hopefully at least 20 feet away (the distance at which the muscles of the eye relax). If possible, look out at the horizon—this expanse is the most relieving sight for the eyes. Have the children pretend they're painting what they see with a paintbrush which extends from between their eyes or the ends of their noses. This “paintbrushing” assures that the eyes are constantly shifting, staying limber, and helps to bring more detail into view. It can be used when sight blurs (e.g., “paintbrush” the letters on the blackboard if they're hard to read). This can easily become a whole body exercise by guiding them to use their whole body as a paintbrush.

2. "Palming"—Cover your closed eyes with cupped hands blocking out all light. Rest the elbows on desk or pillows. Relax your mind. Visualize black things to enhance your experience of darkness. Have something like black velvet to hold at to remind you of black. Imagine something in great detail, perfectly clearly.

3. Teach gentle massaging around the eyes rather than rubbing the eyes directly. Remind your small friends to blink and breathe and to drink plenty of water which helps to lubricate the eyes. In India, Yoga eye stretches are done—up and down, side to side, through the diagonals and in circles—encouraging smooth movement of the eyes; the head remaining perfectly still. Relaxation is a key to healthy eyes. Nearsightedness often results from chronic eye and neck tension. Use these methods during breaks or to end a class.

EXERCISE I

Use thumbs to massage inside eyebrow corners with other fingers slightly curled against forehead. (8 times)

EXERCISE II

Use thumb and index finger to massage nose bridge. Press downward and then upward. (8 times)

EYE EXERCISES

from the People’s Republic of China

1. Keep eyes closed while doing the exercises
2. Fingernails should be short and hands clean

Contact Quarterly
**MOVEMENT & CHILDREN**

**VISUAL STIMULATION**

1. Get up and stretch whenever possible. Have the kids look up, down, right and left, first slowly, then more rapidly. While rapidly changing focus, name out (loudly or softly) the color or object being seen. Also vary the directions or add others by having them change facings.

2. Keep the environment visually stimulating, especially in large dance spaces. Mirrors can be used creatively if students are encouraged to be aware of as many other people (or their socks) as possible, either through their peripheral vision while watching the leader, or by shifting their focus actively from classmate to classmate. Use 3D examples and color when demonstrating an idea. Let kids be involved in arranging classroom or home furniture and artwork. It’s more inviting visually if they’ve helped to create it.

3. Roll and throw balls of many colors and sizes at different distances and levels. Emphasize watching the ball, noticing the path it makes through space until the moment it reaches the hands. For older kids, it’s fun to practice throwing and catching simultaneously either with a partner or across a circle of many people and many balls. You can also have them look at something in the distance as they catch the ball or balls, exercising their peripheral vision.

4. Choose partners, and have A track B’s hand, finger, nose, toes or self-selected body part. First A stays very still and just uses his/her eyes as B runs round. Then they both move through ‘entire room changing directions, speeds and movement qualities as they rack’. Encourage them to make it challenging but not impossible for each partner. A can also choose a B to follow without letting B know where it is. B tries to guess after a few minutes. Then they reverse roles.

**INTEGRATION OF THE SENSES**

1. Provide opportunities to touch things as much as possible. Accurate vision is supported by corresponding information from the ears, nose, mouth and skin. Give the eyes a rest and other senses a boost by doing special walks with blindfolds on. This also brings awareness to the vestibular system (the organ of equilibrium and balance) which works in tandem with vision (for spatial orientation). On the other hand, for those children that may be inattentive to the visual environment, device a game in which incoming sound and/or speech are inhibited, calling on vision to become more alert.

2. Move, imagining you’re seeing a world you have never touched. Or imagine moving through different substances or environments without being able to see. Take a walk imagining you can touch with your eyes—remembering the feeling of different textures as you look at them.

**DEVELOPING AWARENESS**

1. Play pirates. Using eyepatches, have kids interact freely or on an obstacle course which you can construct together. After drawing or doing familiar tasks with one eye patched, have them discuss the differences of seeing with their right eye, left eye and both eyes together. In general, it’s important to give them time to share their perceptions and appreciate those of others.

2. Draw pictures of how they ‘see’ themselves or others; draw pictures of eyes expressing different feelings. Share observations and feelings about the process and results of the drawings.

Throughout these experiences, be aware of emotions as they arise for the children. Some people feel great anxiety with only one eye available for looking. Others are threatened by relying totally on their peripheral vision. These are important clues about their visual mechanism which should be recorded and worked with further, perhaps by you or with a vision specialist. Most of all, have fun and remember that the eyes need stimulation and play just like the rest of our being.

**EXERCISE III**

(B times)

With thumbs on lower jawbone, place index fingers and middle fingers together against both sides of nose near nostrils. Then lower middle fingers and massage the cheeks where the index fingers remain.

**SUGGESTED READING**

Visionetics. Lisette Scholl. Doubleday, Dolphin Book, N.Y., 1978. (Provides some information about the eyes and 20 excellent holistic vision sessions inclusive of whole body warm-up, eye warm-ups and a “main event” which teaches a visual skill.)

Total Vision. Dr. Richard Kaminer and Lorraine Dusky. A & W Visual Library, N.Y., 1978. (Very informative book about vision and vision therapy. Includes information about visual development during infancy, relationship of vitamins and minerals to healthy eyesight, and vision games which can be practiced at home.)

Do You Really Need Eyeglasses? Dr. Marilyn B. Rosanes-Beerrett. Hart Publishing, N.Y., 1974. (Describes the personality of different visual problems and how to work with them using Dr. Bates’ Method of Vision Improvement.)


Eyes O.K., I’m O.K. Harold Wiener, OD. Academecy Therapy Publications, P.O. Box 899, San Rafael, California 94901, 1977. (Describes visual skills, resting, and training particularly as they relate to language, handwriting, arithmetic and spelling acquisition.)


I’m waiting for a good book on vision and motor development.

**EXERCISE IV**

(B times)

With index finger curved under and thumbs on each side of forehead, use the sides of the index fingers to rub outward following the diagram pattern: 2-3-4-5-6.

Sprin/Summer 1978