

Section VIII – Orientation and Mobility

Orientation and mobility (O & M) instruction prepares a student with a visual impairment to travel independently and safely. Orientation skills help a student to be aware of his/her own body in space and the surrounding environment. Mobility skills are specific techniques used to enable a student to move easily from one place to another. Orientation and mobility includes both mental orientation and physical locomotion.

Orientation and mobility skills contribute to development in social skills, mental and physical interactions and the general well-being of the student. These skills are needed for the student with low vision as well as the student with blindness.

Formal orientation and mobility training will be planned and introduced by an O & M instructor from CNIB, contracted through Saskatchewan Learning. The initial referral must be made through an ACCESS Team member. Skills taught by the O & M instructor include sighted guide skills, protective techniques, cane instruction, street crossings and public transportation. However, it is up to the resource teacher to develop and implement the program. The amount of O & M training that a student will require depends on each student and how much vision he/she has. A student will need to acquire the basic concepts.

O & M should be incorporated into the student's program plan and timetable. An individual program is determined by considering the following factors:

- diagnosis and degree of visual impairment;
- prognosis of visual impairment;
- functional vision;
- presence of other disabilities;
- age;
- cognitive functioning;
- general health;
- school and community environment; and
- family, school and community resources.

Orientation skills can be incorporated within many regular classroom activities, particularly in preschool and early elementary classes. Games, songs and activities can be used to teach or reinforce concepts such as body awareness and naming body parts, positional concepts, sensory awareness and basic movement patterns. See Appendix 6.

Specific learning experiences planned for individual students can be taught and reinforced incidentally throughout the school day.

- Environmental awareness - includes awareness of air temperature, air currents, sun, scents, sounds, floor and wall coverings, furniture arrangement and objects in the hallway.
- Identifying landmarks - any permanent sensory information that assists an individual during independent travel. Learning that the first door on the left is

the library entrance or that the flooring changes from linoleum to carpet at the reading centre, helps students locate themselves within the school environment. Landmarks should have significance for the student.

- Identifying structural components of rooms and buildings - use models such as doll houses, Lego models and play house centres to help students understand concepts that they may not be able to experience visually. These may include corner, doorway, window, heating elements, basement, hallway, etc.
- Identifying directionality - left/right, followed by cardinal directions (north, south, east, west).
- Interpreting depth perception - coping skills to perceive relative distance of objects and their relationship to each other (stairs, curbs, terrain).

A student with sight learns what is in his/her environment by observation. This learning is limited for a student with a visual impairment. The more impaired the vision, the more impaired this learning will be. To help the student understand his/her environment:

- point out environment symbols (signs, symbols, labels);
- point out objects in the environment so the student can make an association

between the shape and its name;

- provide labels in the student's surroundings. Be sure they are clear with good contrast; and
- teach the meaning of gestures and facial expressions to the student.

Mobility skills must be chosen to meet each student's specific needs and situation. Some common mobility skills need to be taught:

- **Sighted guide** - one option for getting from place to place is to utilize the assistance of a sighted guide. Teachers, staff, family members and peers can act as sighted guides and should be taught guide techniques. See Appendix 13.
- **Cane skills** - the long white cane is a device that is used successfully by students with visual impairments, including those with additional disabilities. A white cane may be used for identification purposes for a student with low vision. See Appendix 14. Once the need for the long white cane is determined, orientation and mobility instruction must commence to develop this highly essential and specialized skill. If the long white cane will be the eventual mobility device of choice, a positive attitude for its use must be established early.
- **Trailing** - is a method that can be used to get to a desired location while maintaining contact with a surface. This means of travel is taught to facilitate orientation by memorizing landmarks located along a frequently travelled route. The trailing technique is demonstrated by extending one's arm at a 45 degree angle in front and to the side of the body, with the back of the hand following the trailing surface.
- **Self-protection** techniques - are methods to protect the student's body from contact with obstacles. Either arm can be used in combination with upper or lower protective techniques. In upper protective technique the arm is held across the

upper body with the elbow bent and the palm facing forward. In the lower protective technique the arm is held across the middle of the body with the elbow straight and the palm facing inward. See Appendix 15.

- **Search technique** - used to safely locate a dropped object. See Appendix 16.
- **Travel experience** - travel may be according to directions, or to an immediate goal. The student should be able to plan his/her route using tactile maps, following simple routes using landmark sequencing and reverse directions to return to point of origin. The student should be able to travel within the home, school, neighbourhood, town and city. In order to accomplish this, the student will need to be proficient at crossing a variety of streets. A student needs to develop travel routes such as home to school, quiet residential areas, small business areas, shopping areas, home to shopping areas and inside stores and businesses. He/She needs skills for using elevators and escalators, revolving doors, public transportation, travel in unknown areas and travel in adverse weather conditions.
- **Social skills** - appropriate behaviour in public is very important. A student will need to know who, where and how to ask for help, how to refuse help, common courtesy in public, shopping skills, restaurant skills and phone resources for planning travel.

Mobility Aids

- Guide Dog – can be considered after age 16. Contact CNIB.
- White Cane – see Appendix 14.
- Optical Aids – a student with low vision may benefit from the use of a

monocular or binocular for travel.
- Adaptations for wheelchair travel.
- Pre-cane devices – contact CNIB.