# Promoting Higher Education and Assistance for the Blind and Visually Impaired in Israel: the Model for the "Aleh" Society

Moshe Oved<sup>1</sup> and Zohar Ginio<sup>2</sup>

<sup>1</sup>The "Aleh" Society, Jerusalem, Israel mosheo@savion.huji.ac.il

<sup>2</sup>The "Aleh" Society, Jerusalem, Israel Blind\_forum@savion.huji.ac.il

### ABSTRACT

The Aleh Association was established in 1990 as an association affiliated with the Hebrew University run by blind students, predominantly to support their peers promoting academic education of blind young people in Israel. Its operation began with five students and accommodates over 450 at present. The result of the founders' efforts was an unprecedented innovation: people with disabilities empowering themselves for their own benefit, relying on education as the most significant rehabilitative component in altering their social status and inclusion in Israeli society.

# **1. INTRODUCTION**

Aleh activities started long before the computer era. Aleh was an initiative of five blind students, who had been accepted to the Hebrew University and asked the Dean of Students for text reading services. Since the university had no precedent for providing such services, the request prompted the university to take action in the following ways:

Creating the Blind Students Unit in 1985 and appointing one of the blind students as volunteer manager, under the supervision of the Dean of Students. The services offered to visually impaired students entailed: employing volunteers to help in mobility on campus and reading course materials. This first action led to providing tuition exemption for blind students and university dorms accommodations. Until Aleh was recognized as a non-profit association in 1990, there was no national organization supporting tuition assistance to visually impaired students.

Actions taken by the Hebrew University allowed blind students to pursue their studies, without the assistance of the community, and enabled a small number of groundbreaking students to graduate. The difficulty in finding employment, together with the comfort of remaining within the supportive shelter of the

Copyright: © 2015 Oved et al. This is an open-access article dis- tributed under the terms of the <u>Creative Commons Attribution License 3.0</u> <u>Unported</u>, which permits unrestricted use, distribution, and reproduction in any medium, provided the original author and source are credited. university's facilities and environment, encouraged students to stay on and continue their studies indefinitely rather than focus on achieving a degree and negotiating their way to the workforce.

The Hebrew University's modus operandi attitude in accepting blind students into its campus shifted to encourage more blind intellectually fit high school graduates to apply for academic studies. The services were provided by a Support Center, but these were not under the University's budget; thus with the increase in enrollment, the university administration came to believe that self-management could be a positive asset not only in the provision of services but also in fundraising, which was needed to finance these new services. The University's administration suggested that the Support Center form an association whose goal would be to develop and propose program models for blind and visually impaired students and to fundraise for its operations. Fundraising was challenging for students who were devoting their time and effort to their coursework. They were compelled to solicit external help from sighted and blind members in the community. A board was established to navigate the Support Center's management. It comprised representatives of the blind group of students, the small community of blind academics, and the university's administration to form the Aleh Association. This act led to a boost in fundraising momentum for student services, while the new members of the association introduced novel policies and content. It became a turning point in the level of services for blind and visually impaired students.

Several consequences followed: a significant increase in the number of blind students studying at the Hebrew University; the model was adopted by other universities as well as by colleges; the model was acknowledged by relevant government agencies, such as the Ministry of Welfare, and by the Social Security Administration, both of which support the center and individual students; resourceful services were developed, and a time limit was set for achieving a degree; public awareness efforts were put into place to let visually impaired persons and their families know about the option of pursuing university studies as an educational venue and as a preparatory springboard to the workforce after graduation. For a visually impaired student, accessibility extends far beyond orientation in the physical environment. It is of no less importance to access the course information, as well as for every aspect of our lives. Most of us obtain our information through the use of "mediators" such as written and electronic media, while others, limited in access to these media and in mobility, are heavily dependent on another human being to provide them with data relevant for decision making. The process of receiving and sorting through information is not simple for any person, and it is even harder for a visually impaired person, especially given the veritable flood of information currently available.

For visually impaired students in academia, this difficulty is especially acute. They are expected to obtain information for their education from books, scientific journals, newspapers, and computers, all of which, for the most part, are inaccessible to them. Two elements make information accessible:

a. Navigation which is how the student finds the specific information required, be it from a book in the

specific information required, be it from a book in the library, a website on the Internet, an article in a journal, etc. Navigation requires good skills and knowledge of where information can be found, as well as fluency in the use of the tools employed by visually impaired students.

b. Reading the material, once identified. A blind student must have the capacity to read the information in one way or another.

### 2. THE MODEL: HUMAN ASSISTANCE, TECHNOLOGY, AND REHABILI-TATION SUPPORT

At Aleh, a model to address both of the aforementioned elements of accessibility was developed, allowing the blind student to overcome the challenges of accessing information independently. The main goal has been to assist blind students' concrete objective difficulties. However, the model also aims to develop skills to enable the students to be able to function independently within any environment once away from campus. The model has several components: a human facet, a technological aspect, a joint technological-human facet, and a rehabilitation aspect, all of which facilitate the blind students' independence. The model is dynamic, reducing the dependence gradually, making multidimensional use of tools, without viewing technology as the sole and one-dimensional solution to the accessibility issue.

### 2.1 The Human Aspect

As soon as a blind student has enrolled in a university, orientation and mobility is given primary emphasis. Teaching the student to reach places of importance for him, such as classrooms, libraries and faculty offices, in addition to teaching him to become familiar with technological equipment, internal and external sources of assistance, and managing his account with the university's administration. Simultaneously, students begin learning how to search for academic sources. A sighted student and/or an experienced blind student guides the newly admitted blind student, coaching him on practical ways of searching for information: the layout of the library facility, searching for library books via computer, locating books on the shelves, navigating electronic information, searching through audio libraries locally and around the world, checking for recorded versions of books and articles, Braille versions, or large print versions, etc. Some of this instruction is held by rehabilitation instructors who familiarize the student with the environment of the university and the internal computer system. As the academic year begins, the model transitions to addressing the reading element, given that the blind student gained the skills to navigate and locate the information. During this stage, the human aspect is important as well, both for reading class material to the student and for getting the student acquainted with his specific course materials. The difficulty with having an assistant read to the visually impaired student is that it constitutes a mediated reading; the reader, whether consciously or unconsciously, puts his or her personal emphasis on the information relayed to the listener. To prevent this effect as much as possible, the out-loud readings are minimized while the blind student progresses in his degree, to the point where he gradually learns to use reading technologies which are at his disposal.

### 2.2 The Technological Aspect

The phrase "technology liberates" can express the visually impaired person's ability to access information without depending on human assistance, though it mostly applies to reading. What happens when the blind person is not fluent in computers and the auxiliary digital equipment? Can this person be considered independent? For technology to assure independence the blind student must master the process of computer navigation, so that he can access the unlimited resources of information. The ability to navigate is the basis of accessing all information on the Internet. The more the blind person masters the digital technology and Aleh's state-of-the-art technology at his disposal, the less dependent he is on mediated readings, and the more he can make independent use of technology required for progressing in his studies.



**Figure 1.** The following figure is a model that illustrates this progression. (The darker triangle represents human assistance, and the lighter triangle represents technology).

Stage One is the student's arrival at the university, during which time he depends on human assistance for mobility and reading, to a greater degree than he depends on technology. Through an ongoing process of instruction, the use of human assistance and the use of technological assistance balance out over the course of stages 2 and 3, based on the student's rate of progression. In stage 4, the tables are reversed, and the blind student becomes independent in orientation and mobility, locating reading information, trusting and using technology over human assistance. However, the human aspect continues to remain relevant because fastpaced technological advancements require tutorials for almost every newly born innovation.

### 2.3The Rehabilitative Aspect

A significant component supporting the student throughout the stages of the model is the rehabilitative aspect. This is managed by social workers with psychotherapy skills who help the students on the emotional and social spectrums.

The various types of assistance given to the student as they arrive at the university include orientation and mobility; overview of the courses; overview of Aleh services; teaching aids tailored to each individual student; establishing a connection to social services, to the supervisors of services for the blind, and to social security services and rehabilitative services; coordinating with the various university courses and conducting tests to track the student's progress, and to identify and pinpoint areas of difficulty; providing care for personal issues such as test anxiety and personal crisis during the academic year; providing grants and offering financial support to students in therapeutic professions and in the sciences; and finally, preparing the student for post-graduation life. The social workers contribution to the well-being of the student is crucial when it comes to caring for and upholding the student's progress throughout the stages of the model.

Aleh made services available to all visually impaired students at the Hebrew University at its support centers, as well as at all universities and colleges in Israel. In most of them, multipurpose facilities are available with the specialized equipment for blind students as well as allocated classrooms and libraries. Aleh provides computer equipment to the students, making it accessible for use throughout the years they study both at the center and at home. The range of equipment available includes: CCTV models with various magnification powers; laptops with large print software; voice-over screens; Braille displays; portable CCTVs; software for converting PDF files into sound files; and MP3 players, among other devices. In addition, the student may use human assistance for personal readings and tutorials as well as in operating the equipment; a digital talking books library with over 2,000 titles; and a library of Braille and large-print books. All these technological resources constitute a model of accessibility for a wide variety of forms of assistance, both human and technological, allowing the blind student an equal opportunity to be compatible with other students.

### **3. EXPANDING THE MODEL**

Pre academic programs Promoting higher education among visually impaired young potential candidates for academic studies forced Aleh to reach them at a very early age and communicate with their families. Five programs channel the information to cross-sections of young people in the community.

# 3.1 National Mentoring Project for Blind Children and Parents of Blind Children

This program is led by visually impaired students who become mentors to school age pupils with low vision. The mentorship is ongoing throughout the academic year. The mentors receives a scholarship for their involvement. The children, aged 5-18, are integrated into the regular education system.

The child is mentored for four weekly hours, either at his home, at a place of his choice, or both. Activities include assistance with schoolwork/tutoring and recreational activities, such as going to the movies or the pool, taking hikes together, or visiting a museum. Aleh screens the mentors to match them with suitable one-on-one and group activities. Aleh screens the children in need of specific assistance. Another aspect of the program is providing assistance to parents of blind children — for example, self-help workshops for parents of blind children offering support in coping with a child with disability. By involving blind students as mentors, the project fulfills two main goals: providing a rolemodel in the form of a young adult who is a blind student; and providing a fieldwork framework for the mentors. This serves as an initial introduction to the workforce.

# **3.2 Post-High School Preparatory Classes for the Blind and Visually Impaired Students**

Aleh, along with the Dean of Students, runs a post-highschool pre-academic preparatory class for visually impaired candidates at the University campus. This is an on-campus yet separate program. The preparatory classes aim to improve skills for those who completed high school matriculation exams or who wish to improve their matriculation scores. The students are tutored in small classes, using state-of-the-art technological equipment with accessories for blind and visually impaired students. Each student has a support curriculum tailored to his specific needs and abilities, based on his high school achievements. The majority of students in the preparatory program stay at the dorms. Additional housing includes university rehabilitation apartments where the students live under supervision of Aleh's social worker. Activities at the rehabilitation apartments are intended to increase independence and improve ADL.

The introductory class offers an opportunity to complete matriculation exams in a period of up to two years. In addition, it offers guidance for pursuing higher education, scientific writing skills, text-reading skills, computer skills, and a variety of social activities, such as day trips, seminars, parties, and sports. The introductory class is geared for those between the ages of 18 and 30 who possess a blind ID card or a certificate of visual impairment and have either no matriculation exams, incomplete matriculation exams, or matriculation scores that are insufficient for admission to academic education. By the end of the process, over 90% of the students in the preparatory class are eligible for matriculation, with scores that enable admission to university.

### 3.3 Preparatory Courses for the Psychometric Exam

As part of its efforts in promoting higher education among blind and visually impaired high school graduates, Aleh operates preliminary courses for the Psychometric Exams. which are tailored to accommodate individuals with visual disabilities. The courses take place once or twice a year and are offered in a few languages, most often in Hebrew and Arabic. The classes are held in small groups of 7 to 15 students. The teaching format is by frontal instruction and students are also given individual tutoring. In addition, course materials are provided in large-print or audio to suit the student's visual ability. Five exam simulations are held throughout the course. The simulation replicates exams by the National Testing and Evaluations Institute (with an added test time, large print, special marker, and computerized or human assistance as the student prefers). The number of hours each student devotes to the tutoring varies according to each individual's ability.

Students who are totally blind are assigned a personal mentor for assistance.

### 3.4 "Aluma" – A National Service Program for the Blind and Visually Impaired

The "Aluma" program allows visually impaired individuals who have been denied compulsory military service on account of their visual disability to become involved in national service, as an alternative to the military service. Becoming active in the national service program gets the youngsters ready to leave the safe shelter of their families and face life on their own, helping them experience a responsible activity, no less important than the obligatory military service as contributing their share to the community. This program is for youngsters' aged 18-21 who completed high school. The voluntary national service takes 30 hours per week and lasts one or two years at various organizations. Concomitantly, they are obligated to attend functional rehabilitation training for 10 hours per week. The outcome of this program is gainful employment skills within organizations such as kindergartens, schools, hospitals, nursing homes, institutions for children with special needs, radio broadcasting services, city hall administration, and the Presidential home. Participants in the program become ambassadors to changing the general public attitude toward blind people.

### 3.5 Academic Preparation Workshops

These workshops are geared to assist the **newly** admitted students in orientation and mobility on campus and further train them in activities of daily living at the university dorm, living with roommates, shopping for groceries, handling a budget, etc., in addition to acquainting them with the university, coaching them in how to make study plans, introducing them to the variety of services offered by the university and by Aleh, connecting them with a number of institutions in the community, such as the Social Security Department and social and medical services.

The first part of the workshop includes guidance in all matters pertaining to the transition into academia and the discussion of possible concerns, challenges, difficulties, and dilemmas regarding the upcoming academic school year; creating their choice of schedule and time management strategies; introduction to students' rights in the university and the links between universities in Israel. The second part of the workshop provides an introduction to the technology available to the blind student on campus, which equipment and accessories available in the market are best, skills and strategies for academic studies, an overview of course classes, test formats, life as a student with visual disabilities, and the resourceful assistance provided by Aleh. In the third part of the workshop, the prospective students meet experienced blind students, who share information and their personal accounts and exchange experiences.

### 3.6 .Post-Graduate Programs for Visually Impaired Students

This program promotes gradual integration of the students into the community as they approach graduation. The programs are divided in two: 1) a job seeking workshop that covers writing a resume, jobhunting techniques, how to introduce oneself to potential employers, etc.; and 2) programs furnishing internship experience work environments prior to hitting the open market. This may include mentoring young blind children, coordinating programs at Aleh, volunteering at different workplaces, editing and anchoring on-campus radio programs, taking part as actors in the blind theater group, and operating a Rehabilitation Information Station at eye clinics where they provide guidance to newly blind people regarding rehabilitative programs and services for visually impaired people in the country. This program is most fitting for students in the fields of social work, psychology, education, and special education.

# **4. CONCLUSION**

After 25 years of enduring efforts, the association is managed by graduates of the university departments. From small-scale activities the association developed into a multiple service provider to visually impaired individuals seeking academic education, assuring their successful graduation and compatibility for employment in the field of their studies.

Aleh caters at present to 450 visually impaired students at universities, colleges and seminars. In addition, it supports 500 pupils at elementary schools around the country and 200 high school pupils. These programs are implemented in cooperation with rehabilitation services in the community. It is a great achievement to observe visually impaired individuals, who at one time had no chance of attaining academic education, overcome the challenge by using Aleh services, graduating successfully and joining the work force.

A longitudinal survey spanning more than 10 years (1991-2001) of blind university and college graduates, conducted by the Brookdale Institute and published in 2004, reveals that majority of graduates (80%) had completed their bachelor's degree in three to four years. This is a significant change from the numerous years spent at university by blind students before 1991. About 70% of the visually impaired graduates supported by Aleh programs are working in the open market (as opposed to sheltered workshops), while among the general blind population, only 26% are employed. This figure is in line with the average in other western countries. 80% of the graduates are taking part in the workforce and over 55% of graduates are employed full time (Berman and Naon, 2004).

Another study conducted at Bar Ilan University and published in 2012 confirmed the above-noted results. The finding suggests that 70% of graduates supported by Aleh programs are employed. The study emphasizes that 60% of those surveyed are employed part-time to full-time (Yeshurun, 2012). These findings point out the change in attitude by both the blind graduates themselves as well as by the community toward them and highlight their self-empowerment.

### REFERNCES

- 1. Berman, E. & Naon, D. (2004). University Graduates with Vision Impairments: The Contribution of ALEH during their Studies, and a Follow-up of their Integration into the Job Market, JDC-Brookdale Institute, Jerusalem.
- 2. Yeshurun, R. (2012). Factors Impacting Integration in the Job Market for Blind and Visually Impaired Persons Holding Academic Degrees. A Master's Thesis, Bar Ilan University: Self Published.