

## Program of Intervention Referred To the Social-Emotional Development of Deaf-Blind Students

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### Abstract

The purpose of the study is to develop an interventional educational plan for a deaf-blind student with screened difficulties in socio-emotional development. This is part of a more extensive research in developing the screening inventory for the deaf-blind students' cognitive and communicative profile. The study uses a qualitative research methodology and adopts an interpretative position. The aim of the inquiry was descriptive. We followed the case study methodology. The application of the interventional program aimed to help the deaf-blind student in discerning and naming the emotions through tactile emotional cards, tactile stories and role playing. The student was offered multisensory and concrete experiences in order to promote socio-emotional development. Through the intervention the student managed to name, recognize and organize her emotions, recognize the feelings of others and started to participate and be engaged in social relationships not only with her educators, but also with other children.

**Keywords:** social-emotional development, deafblind student, case study

### INTRODUCTION

The child's level of cognitive functioning and its ability to establish and elaborate on meaningful emotional development depends, up to a large extent, on its ability to receive and integrate inputs from the world around it. The ability to integrate sensory inputs influences the communication, concept development and social development [1, 2, 3]. Therefore, cognition, communication and socioemotional development are seriously affected by the combined loss of vision and hearing, since the deafblind student may not perceive concurrent physical and emotional stimuli [4].

#### **The deaf-blind population: Social and Emotional Development of deafblind children**

The child's emotional bond with the persons around him, accomplished through the eye contact, smile, facial expressions, vocalizations and touching, fosters the emotional development. The establishment of human bonds is driven usually through vision and leads in attachment, a fundamental stage on which emotional and social development, cognitive and communicative skills and self-concept are relied. [4, 5, 6, 7]

Deafblind children may not learn spontaneously from their environment or influence and control it directly. Therefore, usually, they learn many things and gain experiences through physical contact and structured motor activities. Even emotional bonding with parents relies on physical contact and often is impeded by sensory deprivation and tactile defensiveness. The deaf blind child is not exposed in visual information gained from the body language and the facial expressions. [9,10,11,12] Additionally, the child does not perceive and experience the auditory stimulation from the parents' voice intonation. Moreover the self-awareness, self-concept development and body awareness, often, may only be perceived during structured

locomotion activities and through tactile stimulation and exploration. The deafblind child cannot rely upon his visual and auditory exploration to learn social skills through imitation and trial and error. The child needs a reactive and communicative environment of trusted relationships in order to build up emotional bonds, which provide emotional security, before the introduction of any educational sequence [13,14,15].

### **METHODOLOGY**

The presented study is part of a more extensive research in developing the screening inventory for the deaf-blind students' cognitive and communicative profile. The study uses a qualitative research methodology and adopts an interpretative position. The aim of the inquiry was descriptive. The case study methodology was followed and data were collected using the method of direct observation.

The uniqueness of each deaf-blind child and the heterogeneity among the deaf-blind population has led us to the application of the methodological approach of case study and observation method.

The screening inventory and the interventional program are implemented through specially designed educational material (multisensory activities which focus on the use of the remaining senses of touch, smell and sensory cues from temperature, air blow and vibration), assistive technology and augmentative and alternative expressive and receptive communication systems (tactile sign language, pictograms, objects of reference, tactile symbols).

The research design employed in this research is a case study starting by screening the student's communicative and cognitive profile. The recorded difficulties framed the planning and implementation of the educational plan of intervention. The application of the interventional program focused on promoting the deaf-blind student's social and emotional development through multisensory and concrete experiences [16, 17].

### **The Program of Intervention**

The case study reported here was conducted at a school for deaf-blind students and was incorporated in the educational program for school-age students who are deafblind. The student is diagnosed with brain damage, congenital blindness and deafness due to viral infection, and therefore was eligible to follow a special educational program for deaf-blind students. The student communicates in others people's hands through tactile sign language. She also uses objects of reference, pictograms, tactile symbols, tactile cues and Braille, as means of receptive and expressive communication. The sense of touch is her main link to the world and the people around her. She has established an emotional bond with her educator. [16,17,18,19]

In this presentation we focus on the student's screened difficulty in emotional development. The program of intervention was designed according to the screened difficulties of the student. More specifically, the student could not express and name her emotions and has difficulties in social interactions with peers. Through this program of intervention the student was expected to recognize and name the emotions of herself and others and participate in shared social activities with educators and peers.

The educator chose activities that encouraged the student to recognize and name her emotional condition. Student's interest was stimulated and triggered using multisensory

material and experiential experiences, while communication was conducted through tactile sign language and tactile, touch cues. The activities were structured experientially, designed in sequences of movements and focusing on daily activities in which the student was actively participating and interested in (role playing, cooking). At the beginning the educator constructed tactile emotional cards and has chosen differentiated emotional situations from the student's daily routine in order to present the arisen emotions. [1, 20] Gradually, the educator "collected" emotional moments (happiness, sadness, anger) and directed appropriately the student by using the tactile emotional cards in order to recognize, perceive and name the emotional situations. Additionally, the student was taught to "read" through her hand the facial expressions of the educator and translate all the behavioral elements that reveal the educator's emotional status, such as the facial expressions, the body proximity, the body position, the intonation and the breath rhythm and the air exposed while talking, the hands tension while signing, since the student communicated through alternative communicative systems (tactile sign language, tactile symbols, tactile and touch cues). The educator created tactile emotional stories based on the student's experiences, in order the student to recall the emotional situations. The student enjoyed reading the tactile emotional stories and got involved in role playing games. She followed the story scenario and expressed the perceived emotions. Gradually, the educator introduced new, unknown emotional stories in role playing and the student managed to perceive the emotional situation and adjust her emotional expression. The process that may at first be described as a sequence of sensory activities has been gradually developed to trigger internal representations. The student became aware of her emotions and gradually she started to recognize and name the feelings of the adults or peers around her, while got involved in structured social play with them.

### CONCLUSION

The educational program with deaf blind students starts with the senses, moves to perception and ends up in cognition. Deaf blind students should be introduced to concepts basing them on their emotional experiences and sensory exploration. [11]. The deaf blind student needs to perceive and evaluate the sources of information, develop and enlarge their conceptual background in order to correlate new experiences to previous ones by understanding, reasoning and interpreting the sensory inputs. Thus, an active and communicative environment, which offers the child opportunities for interaction, is needed. As a result, early social emotional development is promoted and is grounded on concrete experiences. [1]. An educational program fostering the social and emotional development should focus on the development of self-perception and body image, on the recognition of the feelings of self and others and the appropriate behavior in social interactions. [4].

### References

1. J. McInnes, J. Treffry, *Deaf-Blind Infants and Children*, University of Toronto Press, Canada, 1993.
2. L. Alsop, *Understanding Deafblindness. Issues, Perspectives, and Strategies*, SKI-HI Institute, Utah, 2002.
3. P.-D. Stavrou, *Mediation and guidance of containers and contents of children's thoughts : prevention and risk treatment of disharmony and early psychotic disorders / médiation et guidance des contenants et contenus des pensées enfantines : prévention et soin des risques de dysharmonies et de troubles psychotiques précoces*. European Doctorate in Clinical Psychopathology. Université de Picardie Jules Verne, France and University of Lund, Sweden. 2014.
4. C. Jones, *Evaluation and Educational Programming of Students with Deafblindness and Severe Disabilities*, Charles C. Thomas Publisher, LTD, U.S.A., 2002.
5. P.-D. Stavrou, *Construction of a polymethodologic research model for assessment and intervention in schools: The case of school violence and incivility / Construction d'un modèle de recherche pluriméthodologique en vue d'évaluation et d'intervention à l'école : le cas d'incivilités et violences*

- scolaires. Doctorate in Clinical Psychology. Université Paris Descartes – Sorbonne, Laboratoire Psychologie Clinique, Psychopathologie, Psychanalyse – PCPP, France. 2010.
6. D. Sarris, P.-D. Stavrou, L. Stavrou, L'appropriation de la langue écrite chez l'enfant de 5 - 8 ans : le rôle de l'environnement didactique et scolaire / The appropriation of the written language in the child of 5 - 8 years old : the role of the didactic and school environment. In A.O.T. Ahami, Pathologies humaines et déficits du développement : Approche pluridisciplinaire. Laboratoire des Neurosciences, Université Ibn Tofail, Kenitra, Maroc. (2008) 20-32
  7. S. Aitken, Understanding deafblindness. In Aitken, S. et al. Teaching children who are deafblind. David Fulton Publishers : London. (2000) 1-34
  8. L. Stavrou, B. Gibello, D. Sarris, Les problèmes de symbolisation chez l'enfant déficient mental: Approche conceptuelle et étude clinique, Scientific Review of School of Education, University of Ioannina. A' (1997) 187-217.
  9. J. Dammeyer, A.F. Larsen, Communication and language profiles of children with congenital deafblindness, British Journal of Visual Impairment. 34, 3 (2016) 214-224.
  10. J. Kamenopoulou, Challenging Behaviour and Deafblindness: a Critical Review of the Literature, SLD Experience. 42 (2005) 15-22
  11. B. Miles, M. Riggio, Remarkable Conversations, Perkins School for the Blind, Massachusetts, 1999.
  12. J. van Dijk, C. Nelson, History and Change in the Education of Children Who are Deaf-Blind since the Rubella Epidemic of the 1960s: Influence of Methods Developed in the Netherlands, Deaf-Blind Perspectives. 5, 2 (1997) 1-5.
  13. K.A. Bloeming-Wolbrink, M.J. Janssen, W.AJIM Ruijsenaars, R. Menke, J.M. Riksen-Walraven, Effects of changes in life circumstances on interaction and communication in adults with congenital deafblindness and an intellectual disability, British Journal of Visual Impairment. 33, 1(2015) 31-44.
  14. K. Möller, B. Danermark, Social Recognition, Participation, and the Dynamic Between the Environment and Personal Factors of Students With Deafblindness, American Annals of the Deaf. 152, 1 (2007) 42-55.
  15. M. Wahlqvist, K. Möller, C. Möller, B. Danermark, Physical and psychological health, social trust, and financial situation for persons with Usher syndrome type 1, British Journal of Visual Impairment. 34, 1 (2016)15-25.
  16. M. Zeza, P.-D. Stavrou, Intervention Program in Deaf-blind Students: An Educational Plan for Body Schema Awareness, in G. Kouroupetroglou (Ed.), Proceedings of ICEAPVI, 12-14 February, Athens, Greece, (2015) 228-232.
  17. M. Zeza, P.-D. Stavrou, Program of Educational Intervention for Deaf-Blind Students. In Y. Tan, Y. Shi, F. Buarque, A. Gelbukh, S. Das., & A. Engelbrecht (Eds.), Advances in Swarm and Computational Intelligence, Proceedings (Part III) of 6th International Conference, ICSI, 25-28 June Beijing, China, (2015) 472-478
  18. Drigas, D. Kouremenos, J. Vrettaros, M. Karvounis, P.-D. Stavrou, The diagnosis of the educational needs of the hearing impaired. Int. J. Social and Humanistic Computing, 1(2), (2009) 138-148.
  19. J. Vrettaros, K. Argiri, P.-D. Stavrou, K. Hrissagis, A. Drigas, A. Evaluation Study of Pedagogical Methods and E – Learning Material via Web 2.0 for Hearing Impaired People. Technology Enhanced Learning. Quality of Teaching and Educational Reform, Communications in Computer and Information Science, 73, (2010) 595-601.
  20. P. Hart, Using imitation with congenitally deafblind adults: establishing meaningful communication partnerships, Infant and Child Development. 15, 3 (2006) 263-274.