

CONSTRUCTION AND VALIDATION OF A LIFE SKILL TRAINING PROGRAM FOR AUTISTIC CHILDREN

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EXECUTIVE SUMMARY

of

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Project**

**GOVERNMENT COLLEGE OF TEACHER
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I INTRODUCTION

Autism Spectrum Disorder constitutes one of the most complex disorders in the world. It makes no distinction between region, religion or wealth. Children with autism have different levels of impairment which may range from mild symptoms to severe disability. Autism is characterised by social and communicative deficits and repetitive and stereotyped behaviour. Educating children with autism is indeed a challenge, yet one of the greatest gifts one can give them is PERSONAL INDEPENDENCE. Acquisition of Life Skills should indeed be a high priority for autistic children. Life Skills have been defined by WHO as 'abilities for adaptive and positive behaviour that enables individuals to deal effectively with the demands and challenges of everyday life'. Teaching such skills in these children is difficult a task especially because of language and attention deficits as well as the high level of interfering behaviour. But to give up is only an injustice that we do to these less privileged group. A psychologically sound training program has to be designed to impart the basic life skills to these children. In Kerala the awareness of autism is still emerging and availability of resources is in short supply. Some of the institutes that cater to the needs of Autistic children in Kozhikode, Kerala are Ashakiran School situated at Devagiri Calicut and Centre for Research and Development of Autistic children (CRDAC) which was launched in Kerala under the SSA program. Though a commendable job is being carried out by these institutes it is understood that specific programs to develop Life Skills in these children is yet to begin. Training children with such pivotal skills will help them to reach the highest level of independence and acquire age appropriate skills in their home, work, school and community. Hence a treatment plan built on the child's needs and interest, offering a predictable schedule seems to be the need of the hour. The tasks need to be taught in a series of simple steps engaging the child's attention in highly structured activities. Given the right treatment and training options, it is hoped that one can significantly improve the life skills of these less privileged children and make them fit to acquire 'personal independence'. The investigator, through this Minor Research Project, proposes to construct a Life Skill Training Program that will be helpful in developing the essential life skills in such children.

2 OBJECTIVE OF THE STUDY

The objective of the study is to **Construct and Validate a Life Skill training Program for Autistic Children.**

3 DEFINITION OF KEY TERMS

Construct Form (an idea or theory) by bringing together various conceptual elements:

Validate . Assessment of an action, decision, plan, or transaction to establish that it is (1) correct, (2) complete, (3) being implemented (and/or recorded) as intended, and (4) delivering the intended outcome. In

this study Validate means a training program being implemented with a view that it will deliver the intended outcome.

Life Skill Training Program . Life Skills have been defined by the World Health Organization (WHO) as “abilities for adaptive and positive behavior that enable individuals to deal effectively with the demands and challenges of everyday life”. They represent the psycho-social skills that determine valued behaviour and include reflective skills such as problem-solving and critical thinking, to personal skills such as self-awareness, and to interpersonal skills.

Autistic Children Autism is a pervasive developmental disorder characterized by severe deficits in social interaction and communication, by an extremely limited range of activities and interests, and often by the presence of repetitive, stereotyped behaviors. Children coming under this category are autistic children

4 .METHODODOLOGY.

4.1 SAMPLE. The study was conducted on twenty children who were showing autism features.

4.2 TOOL An Autism Treatment Evaluation Checklist (ATEC) was developed by the investigator to study the history of each case selected for the study. A Life Skill Training Program was constructed by the investigator that will be helpful in developing life skills in autistic children.

4.3 STATISTICAL TECHNIQUES .Simple percentage is used in the study

4.4 PROCEDURE Each person on the autism spectrum is unique, with different strengths and weaknesses. Life skills for people with autism usually involves providing training that helps autistic people deal effectively with the demands of daily life. Since most people with autism are cognitively impaired to some degree, it is advisable that the training should involve a combination of therapies, medication and services that help people with autism function with as much independence as possible. At the same time it is necessary to keep in mind some specific tips that will help to deal effectively with such children.. After discussion with experts and extensive review of related literature the investigator identified some useful tips to bear in mind while dealing with such children.

TIPS FOR DEALING WITH AUTISTIC CHILDREN

- ❖ There is no single treatment that will work for everyone.
- ❖ Be consistent in the way you interact with your child
- ❖ Reward good behavior. Always make an effort to “catch them doing something good.”
- ❖ Pay attention to your child’s sensory sensitivities
- ❖ Throwing a tantrum is their way communicating their frustration and getting your attention

- ❖ Communicate by the way you look at your child, the way you touch him / her, and by the tone of your voice and your body language
- ❖ Play is an essential part of learning and shouldn't feel like work.
- ❖ **Never expect immediate results. It may take months or even years for significant changes to appear.**

The last tip was a warning and a word of caution to the investigator. The life skill training program was designed and training was provided to the children keeping in mind their individual differences and their personal needs. Consistency in training was attended and utmost care was taken to reward each good or any positive change in behaviour. Studies show that children with autism tend to do best when they have a highly-structured schedule or routine. Positive reinforcement can go a long way with children with autism. Children were praised when they acted appropriately or learned a new skill, being very specific about what behavior they were being praised for. The investigator paid attention to the kinds of sounds they made, their facial expressions, and the gestures they used when they're tired, hungry, or wanted something. Depending upon the level of impairment, a person with autism usually needs life skills assistance in the following areas:

- Speech and language help
- Communication and social skills training
- How to follow directions
- Potty training
- Dressing independently
- Cooking and housekeeping skills for independent living
- Job training

Due to lack of time the investigator limited the skills to the following skills

- ❖ Sensory Processing
- ❖ Communication
- ❖ Self Regulation
- ❖ Self Determination

The different phases of the work done are given below.

PHASE I. May-June- July 2014

DISCUSSION WITH EXPERTS/ VISIT TO LIBRARIES/VISIT TO INSTITUTIONS

The investigator identified the needs and specialties of Autistic children through extensive reading of literature, discussion with experts and visiting institutions where autistic children are given training, This helped the investigator to get a first hand information of their needs and precautions to be taken while dealing with such children .

PHASE II JULY- AUGUST -SEPTEMBER 2014

PREPARATION OF EVALUATION CHECKLIST/LIFE SKILL TRAINING PROGRAM

The investigator had very fruitful discussions with experts in this field .Visits to institutions where autistic children were being trained enabled the investigator to be aware and conscious of the difficulties that may arise while undergoing the project. Some children are really difficult to handle and it is foolhardy to expect any result from them immediately. Keeping this mind, the investigator prepared an evaluation sheet so that a case study of each of the twenty students selected for the project may be done. (Evaluation checklist attached)The selected twenty children were assessed to observe areas of difficulty (physical, behavioral and social), areas where the child excels, and activities that act as rein forcers. Once these have been identified, the investigator tried to identify the underlying reasons for each type of behavior As a preliminary step a case record of each child was prepared in consultation with the teachers and parents. This was done in order to find out the history of each child, areas of difficulties in communicating, socializing, activity of daily living skills, pre academic skills, health problems etc. The format given in Appendix 1 was used to study each case. Thus a case study of all the twenty students selected for the study was carried out.

Reward Charts:

Reward charts were used to increase the occurrence of a social behavior, to motivate the child and to help the child watch his performance in a tangible way. For every expected behaviour a student gets a star. The child gets a small reward for a certain number of stars. The reward was an activity that the child enjoyed, an edible reward or any tangible reward.

PHASE III. SEPTEMBER- OCTOBER-NOVEMBER-DECEMBER 2014, JANUARY , FEBRUARY, MARCH 2015.

ADMINISTERING THE EVALUATION CHECKLIST , AND LIFE SKILL TRAINING PROGRAM INCLUDING AEROBICS TRAINING.

The evaluation checklist was administered to get a clear picture of the needs and difficulties of each of the twenty students selected for the study. The checklist could be completed only with the support and assistance of the teachers and parents. Wholehearted support from the staff and parents enabled the investigator to get a clear cut picture of each child. A case study of each child was essential since it enabled the investigator to identify their needs, and design a suitable training program and also to find out the changes if any after the training was imparted. After the case study was done the investigator started the life skill training program. Classroom-based competency-building sessions were implemented over a 7- month starting from September 2014 to March 2015 in 24 weekly sessions of approximately 90 minutes in length. Body Awareness activities, Activities for Visual discrimination, Activities to enhance social skills were given slowly. Aerobics training was given for one hour though initially it was for fifteen minutes. The duration was slowly increased keeping a close vigil on the interest and involvement of the children. The investigator kept in constant touch with the parents of the children to learn

about the positive changes as well as difficulties if any especially while undergoing the aerobics training. The investigator was happy to note that children enjoyed each and every activity that was given to them .Children looked forward to the Aerobics class too.

PHASE IV APRIL , MAY 2015

REPORT WRITING, DTP WORK SUBMISSION OF FINAL REPORT TO UGC

5. LIMITATIONS OF THE STUDY The study was intended to develop a life skill training program for Autistic Children. Dealing and treating such children is never an easy task. Each child is unique with specific individual needs and differences. More over such children are extremely slow in grasping concepts and information. They find it difficult to obey instructions and to communicate which made the execution of the project extremely trying .Immediate results can never be expected from such students, yet the investigator is hopeful that if the program is imparted consistently, coupling diligence and hard work apart from the whole hearted cooperation of parents, significant changes can be expected

6.FINDINGS, SUMMARY

Autism is a lifelong developmental disability which affects the way a person communicates and relates to people around them. For the same reason treating such children or rather even dealing with such children is a challenging task. Treatment for autism is usually a very intensive, comprehensive undertaking that involves the child's entire family and a team of professionals. The investigator was well prepared to face the challenges that might be encountered during the course of her study

CASE STUDY

As the first step the investigator selected twenty children who were autistic and they were assessed to observe areas of difficulty (physical, behavioral and social), areas where the child excelled, and activities that acted as rein forcers. Once they were identified, the investigator tried to identify the underlying reasons for each type of behavior As a preliminary step a case record of each child was prepared in consultation with the teachers and parents. This was done in order to find out the history of each child, areas of difficulties in communicating, socializing, activity of daily living skills, pre academic skills, health problems etc.

TREATMENT and FINDINGS

A child's treatment program will depend on his needs and strengths. Although research and experience have revealed many of the mysteries surrounding autism, it remains a complex disorder that impacts each child differently. The investigator took time to know each and every child as an individual. While activities were given his strengths were taken into consideration. Language used was clear, precise and kept to the minimum. Targets were set separately for each child care being taken to see that they were real , realistic and attainable Regular communication was established between

home and school: Miraculous, immediate results were not expected by the investigator. Studies have shown that even minute changes became visible after months of extensive training. The investigator carried out each activity, trying to keep each activity as structured as possible. Children showed remarkable changes in their approach and attitude towards the activities. They looked forward to getting the worksheets, coloring them and getting rewards. Though initial difficulty was very much experienced while giving Aerobics training, the children seemed to enjoy the music and steps of aerobics.

Aerobics provided a platform to burn out their energy and lower their Body Mass Index. Constant touch was kept with the parents and all of them(100%) agreed that their child slept well than earlier. Repetitive behaviour was reduced in a few cases (46%)and a considerable loss of weight was reported by the end of three months in 17% of the cases. A marked improvement in the child's coordination and behaviour was reported by all the parents and other professionals treating the child. They improved their balance and ability to move around. 16 of them acquired a more steady and solid firm gait after 4 weeks of aerobics training. Children progressed from non verbal to verbal, and their eye contact improved Two children presented with no facial expression were seen smiling trying to hold pencils and show an enthusiasm in the work done by their peers. 4 children had core deficits in the physical body and gross motor functioning, 3 had sensory integration issues. 2 children with behavioural issues did not benefit from aerobics training. 17 children had abnormal gait. They exhibited side to side rocking motion carrying their arms in front of their body. Aerobics training helped to improve their gait and maintain their balance. 2 children were extremely energetic, non verbal, with very poor eye contact and exhibiting severe behavioural problems like screaming, kicking, spitting, throwing themselves on the floor. They were least cooperative and were not willing to follow any instructions. Yet they were regularly brought to the aerobics class . At the end of two months children seemed to develop an interest in the training and the investigator is hopeful that more visible changes will be evident in the long run.The Evaluation Checklist was administered at the end of three months and visible changes could be seen which is indicative of a marked improvements in their life skills over a period of time, provided the treatment is given with the utmost care, devotion and goodwill.

Despite the limitation of finding immediate results the investigator is very much sure that the training program will yield fruitful results in the long run. Developing social skills, improving motor competency and social competency is sure to help them reach a high level of independence and acquire age appropriate skills in their home school and community.

APPENDIX I

CASE RECORD (Autism Spectrum Disorder)

Name of Investigator

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Name :
Date of Birth :
Age :
Height :
Weight :
No. of children in the family :
Order of child in the family :
No of children with ASD in the family :
Family History :

S No	Name of Family member	Relationship	Age	Education	Occupation

Pedigree Chart

Pre natal History

Natal and Neo natal history

Place of Birth		Type of delivery	
Birth cry		Colour of baby	
Birth weight		Complications during delivery	
Infections		Any other	

AUTISM TREATMENT EVALUATION CHECKLIST (ATEC)

NAME

AGE

FORM COMPLETED BY

RELATIONSHIP

DATE of EVALUATION

Please indicate by a ✓ mark how far each phrase is true to the child.

SPEECH/LANGUAGE /COMMUNICATION SKILL

S. No	ITEM	Not True	Partially true	Very True
1	Knows own name			
2	Responds to 'NO' or 'STOP'			
3	Can follow simple commands			
4	Can use one word at a time(NO, YES, WATER etc			
5	Can use 2 words at a time(I Want, Don't Want ,Go Home etc)			
6.	Can use 3 or more words at a time(I want to go home. I want some water etc)			
7	Shows signs instead of words			
8	No communication of any sort(Does use words or signs)			
9	Imitates sounds or words			
10	Answers social questions			
11	Verbally explains what he/she wants			
12	Shows sign language for what he/she wants.			
13	Follows verbal instructions			
14	Can follow sign language only			

SOCIAL SKILLS.

S.No	ITEM	VERY TRUE	PARTIALLY TRUE	NOT TRUE
1.	Ignores other people			
2	Pays attention when called by name			
3	Maintains eye contact			
4	Un co-operative and resistant			

5.	Prefers to be left alone			
6	Shows no affection even to family members/ teachers			
7	Dislikes being cuddled/ held close			
8	Waves 'bye-bye' by self			
9	Waves 'bye-bye' if told			
10.	Shows temper tantrums frequently			
11	Rarely smiles			
12	Does not like to mingle with peers			
13.	Insensitive to others feelings			
14.	Indifferent if parents leave			
15.	Likes to play with peers			
16	Does not sit in one place			
17	Does not share personal belongings with peers			
18	Gets angry if not attended to			
19	Always seeks attention			
20	Enjoys talking and playing with self			
21	Prefers to watch others talk/play			

ACTIVITY OF DAILY LIVING SKILLS(ADL)					
S. No	Items	Physical Prompt	Verbal prompt	Independent	With help
BRUSHING					
1	Can identify own brush				
2	Can squeeze paste				
3	Takes brush to mouth				
4	Cleans teeth with brush				
5	Takes water to mouth				
6	spits				
7	Washes face and mouth				
8	Closes tap				
9	Put brush back in position				
TOILETING					
1	Indicates through appropriate actions				
2	Indicates through words				
3	Removes dress				
4	Sits correctly on closet				
5	Passes urines				
6	Passes stool				
7	Washes without wetting clothes				
8	Puts on dress				
BATHING					
1	Gets ready with dresses to				

	change				
2	Closes door				
3	Changes dress only with help				
4	Pours water without help				
5	Lathers soap without help				
6	Applies soap to body				
7	Cleans body with water				
8	Dries with towel				
9	Wears dress				
BUTTENING/ GROOMING					
1.	Can remove button				
2	Can put on buttons				
3	Combs hair				
4	Applies powder				
5	Looks into mirror and dresses				
EATING					
1	Identifies edible and non edible things				
2	Washes hands before eating				

3	Sits properly on chair				
4	Can select/ serve food				
5	Can mix food				
6	Chews properly				
7	Closes mouth while chewing				
8	Makes sounds while chewing				
9	Keeps food in mouth without swallowing				
10	Responds in items that are not to his/her likes/tastes				
11	Very fussy food habits				
12	Drinks water from glass				
13	Can use spoon to eat				
14	Knows to use straw				
15	Eats what is served				
16	Keeps plate/ glass in sink				

PRE ACADEMIC SKILLS

S.No	Skill	Physical Prompt	Verbal prompt	Independent	With help
1	Object- object matching				
2	Picture- picture matching				
3	Object – picture matching				
4	Picture -object matching				
5	Colour- matching				

6	Shape-matching				
7	Pencil grasping				
8	Writes Numbers				
9	Colours within boundary				
10	Joins dots				
11	Copying				
12	Tracing				
13	Counting				
14	Writes letters				

HEALTH / PHYSICAL PROBLEMS

S.No	Area	Not a problem	Minor problem	Moderate problem	Serious problem
1	Bed wetting				
2	Wets dress./under wear				
3	Soils dress/under wear				
4	diarrhea				
5	Constipation				
6	Sleep problem				
7	Eats too much				
8	Eats too little				
9	Hyperactive				
10	Lethargic				
11	Hits/injures self				
12	Hits/injures others				
13	Destructive nature				
14	Sound sensitive				
15	Anxious/fearful				
16	Cries frequently				
17	Often unhappy				
18	seizures				
19	Shouts/screams unnecessarily				
20	Not sensitive to pain				
21	Repetitive movements				
22	Hooked or fixated on certain objects				
23	Steady gait				
24	Dislikes walking				
25	Sits with legs crossed				

