Behavioral Problems among Students with Disabilities in United Arab Emirates

Abdelaziz Sartawi, UAE University

Osha Ahmad AlMuhairy UAE University

Rawhi M. Abdat Ministry of Social Affairs (UAE)

asaratawi@uaeu.ac.ae

Abstract: This study aims to determine the interaction between behavior problems among students with disabilities in United Arab Emirates (UAE) and a number of dependent variables (gender, age, type of disability and severity of disability). The study sample consisted of 297 students enrolled in rehabilitation centers affiliated with the Ministry of Social Affairs. A questionnaire was designed and developed on the basis of its content validity and its reliability. Findings indicated that significant differences in the behavior problems were found for the independent variables of gender, age, type of disability and severity of disability. Male students above eight years old, students with intellectual disability and students with severe disabilities were most likely to exhibit behavior problems. The occurrence of certain behavior problems was found to be relevant to the type of disability. Based on the results of this study, a number of recommendations are provided to help ameliorate behavior problems associated with the variables addressed above. Keywords: behavioral problems, students with disabilities, United Arab Emirates.

Introduction

A behavior problem is defined as a socially inappropriate or harmful behavior to self or to others. Anastasiow, Gallagher and Kirk (2003) define a behavior problem as a deviation from the conduct that is appropriate for a specific age and also interferes with an individual's growth, development and the lives of others. Al-Dakheel, Ibrahem and Ibrahem (1993) believe that children in the Arab World suffer from many behavior problems as a result of social changes in their communities and the lack of specialized

rehabilitation services. Criteria used to quantify behavioral problems are, to some degree, dependent on the context in which the child lives. Thus, a given behavior may be considered a behavior problem in one community, while it is not so in another. In addition, others characteristics of behaviors, such as their shape, frequency and contextual appropriateness should be considered when determining whether they meet the criteria for being a labeled behavioral problems.

Viewing the frequency and the role of behavioral problems of students with disabilities in preventing their psychological and social adaptation as well as in hindering the benefits of providing educational and therapeutic services, this study aims to identify the most frequent behavioral problems of students with disabilities who are enrolled in centers affiliated with the Ministry of Social Affairs in the United Arab Emirates. Behavior problems are examined as they relate to several independent variables, including gender, age, type of disability and severity of disability.

The significance of this study is related to the fact that students with disabilities are vulnerable to behavioral problems resulting from their failure to adapt to the demands of their surrounding communities, their intellectual difficulties and their sensory and motor deficits that impact perceiving stimuli around them. These problems affect students' abilities in acquiring the necessary skills for adapting to the social and academic contexts of their schools.

Considering the importance of this subject and the scarcity of studies that address this problem in the Arab world, especially in the UAE, this study is designed to accomplish the following objectives:

- 1. To identify the behavior problems exhibited by students with disabilities.
- 2. To determine how gender, age, type of disability and severity of disability impact the occurrence of behavior problems in students with disabilities who attend rehabilitation centers.

Literature Review

Tuma (1989) indicated that the prevalence of children suffering from behavioral and mental disorders is 11%. This percentage increases greatly if we add to it those students who have learning problems. According to Al-Sabah (1993), children with disabilities have different types of undesirable behavior patterns. This is emphasized by Al-Khateeb (2003), who states that students with intellectual disabilities comprise the highest percentage of those who suffer from behavioral problems. This is due to their: (a) inability to determine aspects of socially acceptable behavior, (b) lack of linguistic abilities which may predispose them to resort to aggression to express their emotions, (c) exposure to failure and numerous frustrating

experiences as a result of the surrounding social trends and (d) difficulty determining socially acceptable aspects of conduct.

Al-Rosan (2001) highlights a number of common behavioral characteristics that make students with intellectual disability, physical disability and visual impairment more likely to exhibit behavioral problems than others. The most important of these characteristics for students with intellectual disabilities were reduced ability to learn, poor attention and concentration, frustration and feeling of failure, poor memory and difficulties in generalizing learned skills to new situations. He indicated that students with intellectual disability also suffer from the problems of adaptation in their social and professional development, as well as an inclination to be isolated from others. For the population of children who have a physical disability, the occurrence of behavioral problems may relate to the severity of disability. Feelings of anxiety, fear, rejection, aggressiveness, introversion and inferiority might be among the distinguishing characteristics of their behaviors. In addition, these problems are influenced by others' attitudes and reactions towards the students' ability to mobilize. The visually impaired students usually suffer from feelings of failure and frustration which result in lower academic achievement when compared with their peers. Salha's (2007) study on students with visual impairments indicated that they suffer from behavioral and emotional problems, which primarily include fear, anxiety, doubt, dependency and aggressiveness. Salha found that these problems appeared more frequently in females than in males and that they occurred less frequently among the extremely disabled and younger students. Other studies stressed that physically aggressive behavior is rare among blind children, while verbal aggression is much more prevalent (Beblawi & Khudair 2004).

In a study of behavioral problems with deaf women, Samreen (2003) found that they were sensitive and embarrassed which led to shyness, withdrawal or resentment against others. Some of these women became introverted, spiteful, envious of others and showed signs of irritability and defiance. Another study (Jaffal 1994) revealed that students with hearing impairments were likely to withdraw from others and to exhibit externally directed behaviors like aggression. This result was similar to Abdullah (1983) which indicated that students with hearing impairments were characterized by aggressiveness, introversion, emotional imbalance and low social maturity. Brubaker and Szakowski (2000) carried out a study on parents of three and eight years students with hearing impairments. Results indicated that deaf children, according to their parents, suffer from behavior problems, mainly characterized as disobedience to regulations and instructions though such problems were not related to inadequate parenting.

A recent study conducted by Hastings, Lewis, Toogood and Totsika (2008) to investigate behavior problems with students with intellectual

disability suggested that their problematic behavior appears at an early stage and continues throughout life. By tracing behavior problems of students over 11 years, the study indicated that the most common problems were severe physical aggression and self-harm. These behavioral problems were not correlated during the study years. Mackenzie-Davies and Mansell (2007) conducted a twenty-year longitudinal study to examine the frequency of behavioral problems of students. The researchers found that behavior problems identified during the previous 20 years were still being observed.

Frank, Hans, Karen and Marielle (2007) conducted a study to identify developmental behaviors of students with psychological disorders both with and without intellectual disability. A child behavior inventory was used for two samples of students aged 6-18 years. Findings indicated that students with both psychological and intellectual disabilities showed a higher level of behavioral problems in various ages than their peers who did not have intellectual disabilities. It appeared also that there were significant differences between the two samples in aggressive behavior and attention problems. The social problems among intellectually disabled males decreased over time and the aggressive behavior was more frequent among younger students than among students at 18 years of age. In another study, Frank, Hans, Jolanda, Karen and Marielle (2008) investigated the scope of continuity of behavior problems among students with mild intellectual disability in contrast with moderate intellectual disability over five years. This study showed that behavior problems of students with moderate intellectual disability had higher levels of continuity in contrast to students with mild intellectual disability.

Hogue et al. (2007) conducted a study on students with intellectual disabilities who live in residential institutions with different levels of supervision. It was found that students enrolled in higher supervision systems displayed higher physically aggressive behavior than those enrolled in lower supervision systems. However, no differences were observed in externally directed behavior problems, such as verbal aggression, disobedience and hyperactivity. In addition, students enrolled in higher supervision systems had significantly higher levels of self-directed behavior problems, such as anxiety, depression and self-depreciation.

Ross and Cornish (2002) sought to determine the rate and stereotyping of behaviors, self-harm and aggressiveness in children and adolescents with Cri du Chat Syndrome. Findings suggested that 82% of the cases showed stereotyping behaviors and half of the cases showed it daily. Out of 15 forms of self-harm behaviors, it was found that hitting the head, biting and stereotyping were most common. Aggressive behavior reached a higher point (88%) with a negative correlation with age.

This current study extended research in the area of behavioral problems among disabled students since it compared a wide range of behavioral problems across various disabilities. It also added 'gender' as a main variable and parents' views as a primary source of information.

Methodology

Participants

Participants in the present study included students with disabilities enrolled in the five main rehabilitation centers affiliated with the Ministry of Social Affairs in the United Arab Emirates. These centers provide services for students with mild, moderate and severe disabilities. Those students are suffering from intellectual, hearing, physical, and visual disabilities. A total of 512 boys and girls between five and twenty years of age attend these centers. All students whose parents agreed to participate in the study were included and considered to be the sample of the study. Thus, the study sample was 297 boys and girls, which represents 58% of the total student population. Table 1 shows the distribution of participants according to the study variables.

Table 1
Distribution of the sample of the study according to gender and age of subjects and type and severity of disability

Gender	Number	Percentage	
Male	158	53.2%	
Female	139	46.8%	
Age	Number	Percentage	
Less than 8 years	84	28.3%	
8- 12 years	129	43.4%	
13 years and more	84	28.3%	
Type of Disability	Number	Percentage	
Intellectual	202	68%	
Hearing	56	18.9%	
Visual	11	3.7%	
Physical	28	9.4%	
Severity of disability	Number	Percentage	
Mild	63	21.2%	
Moderate	86	29%	
Severe	148	49.8%	
Total	297	100%	

Instrument

The researchers developed a questionnaire to identify behavior problems that were exhibited by students with disabilities. The questionnaire was filled in by social workers and psychologists for each student based on his/her portfolio and consultations with parents. Items of the questionnaire were developed according to the following procedure. All behavior problems recorded in each student's portfolio were specified and converted to a question format. To verify the significance of each problem, frequency, continuity, severity and the need for intervention were taken into consideration. Finally, parents' approval was a factor considered when deciding whether a question would be included in the questionnaire or not.

Ten faculty members from the Special Education Department and the Psychology Department at the UAE University were consulted to evaluate the appropriateness of the language of the instrument and its inclusiveness of the most typical types of behavioral problems in order to ensure its content validity. Seven of the ten reviewers were required to agree on the appropriateness of each item and the order of the questions. Additionally, some items were modified in accordance with the reviewers' recommendations. The reliability for the internal consistency of the questionnaire was 0.91.

Procedures

After assuring the validity and reliability of the study instrument, the researchers took the necessary procedures in order to administer it to the study sample. In the same context, the following procedures were followed:

- 1. Written consents from all parties involved in the study were obtained including administrators of the rehabilitation centers, social workers, psychologists and parents.
- 2. Social workers and psychologists were trained to fill in the study instrument by using samples of the students' portfolios, which included all necessary intervention programs and services. In addition, parents of each child were interviewed to verify the portfolio data and include their views in regard to each behavioral problem. Parents of any student, who needed an intervention through a behavior modification program or educational and psychological sessions for either the student or his/her family, were asked to identify the frequency of any behavior problem identified.
- 3. The data were classified, coded and entered into computers and then treated statistically by using the program of Statistical Packages for Social Sciences (SPSS). Percentages for the frequencies of each behavioral problem in each type of disability were used to identify the privileges of these problems and problems prevailing in each

disability. Chi Square Tests were used to examine statistically significant differences between each problem according to the independent variables.

Results and Discussion

The four main types of identified behavior problems are intellectual, hearing, visual and physical problems.

Do Behaviors Differences Exist for Gender?

Behavior problems were found to be more common among males than females. The significant differences between the observed and expected values were 19.4 among females with no behavioral problems. This result is in conflict with Salha's study (2007) on students with visual disabilities which indicated that behavioral problems among females are higher than males. To verify the result of the current study, an Odds Ratio of 1.936 was calculated. Since it exceeded 1.0, the statistical analysis indicates that there are differences among students with disabilities in relation to behavioral problems. In addition, Risk Ratios exceeded one (1.365) and indicated that male students exhibit more behavioral problems compared to female students.

Table 2 shows that the most common behavior problems among males are obstinacy, aggression and hyperactivity. The significant differences between the observed values and the expected ones were 8.4, 6.6 and 5.7 respectively. This result is in agreement with Al-Zarad (2001), which indicated that the percentage of prevalence of attention deficit and hyperactivity amounts to about 10% of the sample of the study. The percentage of male students suffering from this problem is considerably higher than female students (75%). This study also found out that the most common behavior problem among females is shyness with a difference of 8.4 between the observed and expected values. This result is in agreement with Samreen's (2003) study, which indicated that deaf women are more sensitive and embarrassed with their disabilities. All these elements lead to shyness and withdrawal. This result may be due to the fact that females in oriental societies tend to be shy and they are not provided with the same social opportunities as males.

Table 2

Chi Square test of behavioral problems differences according to gender.

Chi Square te	est of t	pehaviore	al prot	olems dif	terence	es accore	ding to g	gend	er
Behavior	Obs	served	Exp	pected	Re	sidual	Person		Sign.
problems	V	alue	V	alue			Chi-	df	
_							square		
_	Male	Female	Male	Female	Male	Female	-		
No problems	21	55	40.4	35.6	-19.4	19.4			
Anxiety	26	18	23.4	20.6	2.6	-2.6			
Aggression	21	6	14.4	12.6	6.6	-6.6			
Emotional sag	7	1	4.3	3.7	2.7	-2.7			
Impudence	0	2	1.1	0.9	-1.1	1.1			
Obstinacy	27	8	18.6	16.4	8.4	-8.4			
Lying	4	2	3.2	2.8	0.8	-0.8			
Phobia	12	8	10.6	9.4	1.4	-1.4	64.644	14	*0.000
Isolation	7	11	9.6	8.4	-2.6	2.6			
Shyness	6	21	14.4	12.6	-8.4	8.4			
Hyperactivity	19	6	13.3	11.7	5.7	-5.7			
Steeling	1	0	0.5	0.5	0.5	-0.5			
Bedwetting	3	1	1.6	1.4	1.4	-1.4			
Nail-biting	2	1	1.6	1.4	0.4	-0.4			
Sucking fingers	2	0	1.1	0.9	0.9	-0.9			
Total	158	139							

^{*}Alpha = (0.05)

Do Behavior Differences Exist for Age Groups?

Results in Table 3 indicate that there are significant differences in behavioral problems according to the age of the sample of the study in favor of students aged 8 years and above. This is in contrast to those students aged below 8 years, among whom behavior problems did not appear significant since the difference between the observed and expected value between them was 20.5. This result is in conflict with Karen et al. (2007) which concluded that behavioral problems among intellectually disabled males decrease over time. However, that study was only restricted to students with intellectual disabilities.

Findings also show that anxiety is the most common problem among students aged 13 years and above with a difference between observed and expected value at 12.4. This may be due to the fact that those students had reached the adolescent stage and began experiencing changes that might determine their future identity. Findings also indicate that the most common behavior problems among students aged 8-12 years are anxiety, aggression, obstinacy and isolation. The variations calculated between observed and expected values for these problems were 19.1, 10.3, 9.8, and 8.2 respectively. Moreover, the study finds that the most common behavior

problems among students who are less than 8 years old are shyness and phobia with a difference of 7.4 and 7.3 respectively between observed and expected values. This may be due to the insufficient development of social communication skills at this stage and non-adaptation to disability.

Table 3
Chi Square test of behavioral problems differences according to age

Behavior problems	О	bserve Value		Expected Value			·	Residua		Person Chi- square	df	Sign
	Less than 8	8-12	13 & over	Less than 8	8-12	13 & over	Less than 8	8-12	13& over			
No problems	42	22	12	21.5	33	21.5	20.5	-11	-9.5			
Anxiety	0	8	36	12.4	19.1	12.4	-12.4	19.1	12.4			
Aggression	2	22	3	6.7	11.7	7.7	-5.6	10.3	-4.6			
Emotional sag	0	1	7	2.3	3.5	2.3	-2.3	-2.5	4.7			
Impedance	0	0	2	0.6	0.9	0.6	-0.6	-0.9	1.4			
Obstinacy	3	25	7	9.9	15.2	9.9	-6.9	9.8	-2.9			
Lying	0	0	6	1.7	2.6	1.7	-1.7	-2.6	4.3			
Phobia	13	6	1	5.7	8.7	5.7	7.3	-2.7	-4.7	211.74 2	28	*0.000
Isolation	0	16	2	5.1	7.8	5.1	-5.1	8.2	-3.1			
Shyness	15	9	3	7.6	11.7	7.6	7.4	-2.7	-4.6			
Hyperactive	5	16	4	7.1	10.9	7.1	-2.1	5.1	-3.1			
Steeling	0	0	1	0.3	0.4	0.3	-0.3	-0.4	0.7			
Bedwetting	2	1	0	0.8	1.3	0.8	1.2	-0.3	-0.8			
Nail-biting	0	3	0	0.8	1.3	0.8	-0.8	1.7	-0.8			
Sucking Fingers	2	0	0	0.6	0.9	0.6	1.4	-0.9	-0.6			
Total	84	129	84		•	•		•	•	•		

^{*}Alpha = (0.05)

Do Behavior Differences Exist Across Types of Disabilities?

Results in Table 4 indicate that there are significant differences between behavior problems resulting from the type of disability.

Table 4
Person Chi-Square Correlation between Behavioral Problems and the Type of Disability

	Value	Df	Sign.
Person Chi- Square	72.446	42	0.002*

^{*}Alpha = (0.05)

The Chi-Squared Test was used in order to determine the differences between disabilities and to what extent behavioral problems are common in each type of disability. The results appear in tables 5, 6, 7 & 8.

Table 5
Chi-Square test for students with intellectual disability behavior problems

Behavior problems	Percentage	Observed Value	Expected Value	Residual	Chi- square	df	Sign.
No problems	21.8%	44	14.4	29.6			
Anxiety	16.3%	33	14.4	18.6			
Aggression	11.4%	23	14.4	8.6			
Emotional sag	4.0%	8	14.4	-6.4			
Impudence	1.0%	2	14.4	-12.4			
Obstinacy	13.9%	28	14.4	13.6			
Lying	2.5%	5	14.4	-9.4		13	
Phobia	5.9%	12	14.4	-2.4	158.257		*0.000
Isolation	5.0%	10	14.4	-4.4			
Shyness	7.4%	15	14.4	0.6			
Hyperactive	8.4%	17	14.4	2.6			
Steeling	0.5%	1	14.4	-13.4			
Bedwetting	1.0%		-12.4				
Nail-biting	1.0%	2	14.4	-12.4			
Total	100%	202					

^{*}Alpha = (0.05)

Table 5 shows that there are significant differences in the extent of prevalence of behavior problems according to the type of the problem. The study found that the majority of intellectually disabled students face behavioral problems at a percentage of 78.2%. It also showed that only 21.8 of them have no behavioral problems and that anxiety is most common among students with intellectual disability at a percentage of 16.3%, followed by obstinacy at a percentage of 13.9%, then aggression at 11.4%, which are all at a significant level. This result is in agreement with the study of Totsika et al. (2008), which suggested that aggression is the most common problem in this group. However, it is in conflict with the study of Ross et al. (2002) in which aggressive behavior reached a percentage of 88% due to limiting itself to Cri du Chat Syndrome. The reason for the high rate of behavioral problems among students with intellectual disability may be due to unrest, non-adaptation to disability, inclination to self-assertion through obstinate behavior and worrying about facing society and its demands. In addition, the students' lack of verbal ability to express their needs may also contribute to this since it may lead them to resort to aggression.

Table 6
Chi-Square test for students with hearing impaired behavior problems

Behavior	Percentage	Observed	Expected	Residual	Chi-	df	Sign.
problems		Value	Value		square		_
No Problems	35.7%	20	6.2	13.8			
Anxiety	10.7%	6	6.2	-0.2			
Aggression	5.4%	3	6.2	-3.2			
Obstinacy	8.9%	5	6.2	-1.2			
Phobia	1.8%	1	6.2	-5.2	43.00	8	*0.000
Isolation	7.1%	4	6.2	-2.2			
Shyness	14.3%	8	6.2	1.8			
Hyperactive	14.3%	8	6.2	1.8			
Nail-biting	1.8%	1	6.2	-5.2			
Total	100%	56					

^{*}Alpha = (0.05)

Table 6 shows that there are significant differences in the extent of prevalence of behavioral problems among students with hearing impairments. The totals of 64.3% of those students selected for the study were suffering from behavior problems: hyperactivity (14.3%), shyness (14.3%) and anxiety (10.7%). This may be attributed to the inability of students with hearing impairments to communicate with others who do not show any sign of understanding and acceptance. This result is in agreement with Jaffal (1994), which suggested that withdrawal and externally directed behavior are the most noted behavioral problems for students with hearing impairments. Similarly, Al-Sabah (1993) found that these students tend to be introverted.

Table 7
Chi-Square test for students with visual impairments behavior problems

Behavior	Percentage	Observed	Expected	Residual	Chi-	df	Sign.
problems	C	Value	Value		square		Ü
No Problems	18.2%	2	1.8	0.2			
Anxiety	18.2 %	2	1.8	0.2			
Aggression	9.1%	1	1.8	-0.8			
Obstinacy	9.1%	1	1.8	0.8	3.727	5	0.589
Phobia	36.4%	4	1.8	2.2			
Shyness	9.1%	1	1.8	0.8			
Total	100%	11					

Table 7 shows that there are no significant differences in behavior problems among students with visual impairments. The percentages for those who do not suffer from behavior problems are 18.2%. This figure may, however, be unreliable since the number of the students with visual impairments included in the sample for this study was relatively small.

However, this result is in agreement with Salha (2007), which indicated that behavioral and emotional problems such as phobia and anxiety are prevalent among students with visual impairments.

Table 8
Chi-Square test for students with physical disabilities behavior problems

Behavior problems	Percentage	Observed Value	Expected Value	Residual	Chi- square	df	Sign.
No Problems	35.7%	10	3.1	6.9			
Anxiety	10.7%	3	3.1	-0.1			
Obstinacy	3.6%	1	3.1	-2.1			
Lying	3.6%	1	3.1	-2.1			
Phobia	10.7%	3	3.1	-0.1	20.214	8	*0.010
Isolation	14.3%	4	3.1 -0		20.214	8	*0.010
Shyness	10.7%	3	3.1	-0.1			
Bedwetting	3.6%	1	3.1	-2.1			
Sucking fingers	7.1%	2	3.1	-1.1			
Total	100%	28					
Total	100%	28				•	

^{*}Alpha = (0.05)

Table 8 shows that there are significant differences in the extent of prevalence of behavior problems among students with physical disabilities. It shows that 35.7% of them have no behavior problems. It also shows that the most common behavior problems among students with physical disabilities are isolation (14.3%), anxiety, phobia and shyness (10.7% for each). Nevertheless, the variation in these proportions was not found to be statistically significant because the difference between the observed and expected value is negative (-0.9; and -0.1).

In summary, data in Tables 5-8 show that the following percentages of students *are* suffering from behavior problems: 81.8% of students with visual impairment, 78.2% of students with intellectual disabilities, 64.3% of students with physical disabilities and 64.3% of students with hearing impairments. In other words, students with visual impairments face more behavioral problems followed by students with intellectual disabilities. However, these data must be viewed with caution because only 11 students with visual impairments participated in the study while students with intellectual disabilities were the majority in the study (202). In addition, this may be due to the fact that students with intellectual disabilities face many behavioral problems as a result of low mental abilities and adaptability. Consequently, they may be less able to deal with environmental stimulation and be more likely to react in a manner that is inconsistent with the prevailing cultural norm. This result is in accordance with Al-Khateeb's (2003) findings.

Do Differences in Behavior Exist for Severity of Disability?

Data in Table 9 show that there are significant differences in the extent of prevalence of behavioral problems relevant to the severity of disability. The more severe the disability, the more behavior problems occur. This result is in agreement with the findings of Salha (2007). Lying was the most common behavioral problem among students with mild disabilities with a difference of 4.7 between the observed and expected value. Researchers attributed this to the fact that those students have the cognitive ability to engage in manipulation. Anxiety was the most prevalent behavior problem among students with moderate disabilities with a difference of 3.0 between the observed and expected value. This might be because of their reduced physical and sensory abilities which might result in difficulties with communication and concern over their future. Shyness was the most common behavioral problem among the students with severe disabilities with a difference of 9.5 between the observed and expected value and obstinacy with a difference of 7.6. This may be due to the fact that these students are inclined to withdraw and refrain from social activities.

Table 9
Chi-Square test of behavioral problems differences according to the severity of Disability

	(Observed Value	d		Expected Value			Residua	ıl	Person Chi-	Df	Sign
Behavior										square		
problems	Mild	Mode-	Sever	Mild	Mode-	Sever	Mild	Mode-	Sever			
		rate			rate			rate				
No Problems	40	24	12	16.1	22	37.9	23.9	2	-25.9	_		
Anxiety	5	14	25	9.3	12.7	21.9	-4.3	3.0	3.1			
Aggression	4	8	15	5.7	7.8	13.5	-1.7	0.2	1.5			
Emotional	2	4	2	1.7	2.3	4	0.3	1.7	-2			
sag												
Impudence	1	0	1	0.4	0.6	1	0.6	-0.6	0			
Obstinacy	3	7	25	7.4	10.1	17.4	-4.4	-3.1	7.6			
Lying	6	0	0	1.3	1.7	3	4.7	-1.7	-3.0	133.37	28	*0.000
Phobia	0	5	15	4.2	5.8	10	-4.2	-0.8	5			
Isolation	1	8	9	3.8	5.2	9	-2.8	2.8	0			
Shyness	0	11	16	5.7	7.8	13.5	-5.7	-4.2	9.5			
Hyperactive	1	0	0	0.2	0.3	0.5	0.8	-0.3	-0.5			
Steeling	1	0	0	0.2	0.3	0.5	0.8	-0.3	-0.5			
Bedwetting	0	0	3	0.6	0.9	1.5	-0.6	-0.9	1.5			
Nail-biting	0	2	1	0.6	0.9	1.5	-0.6	1.1	-0.5			
Sucking fingers	0	0	2	0.4	0.6	1	-0.4	-0.6	1			
Total	63	86	148									

^{*}Alpha = (0.05)

Summary and Conclusion

This study confirms the findings that male students face more behavioral problems than their female peers. These problems tend to increase by age and severity of the disability. Students with intellectual disabilities exhibit more behavioral problems in comparison with students who are categorized with hearing or visual impairment or with a physical disability. Based on the results of this study, it is recommended that rehabilitation centers:

- Provide appropriate behavior modification programs for students with intellectual disabilities since they are the majority of those suffering from behavior problems.
- Develop psychological and social programs for students with severe disabilities to promote their adaptation and communication skills.
- Support female disabled students psychologically, emotionally, and socially in order to raise their self-confidence to participate in social activities.
- Provide screening services to detect early indicators of behavior problems in order to solve them before they become exacerbated and before they influence other aspects of students' development.
- Provide programs that help students with disabilities to be aware of their abilities. Advising services should be offered to help them take advantage of those abilities. This will reduce the anxiety they may experience as a result of feeling insecure.

References:

- Abdullah, A. (1983). Psychological characteristics of students with hearing impairment, unpublished Master Thesis, Faculty of Arts, Zaqaziq University.
- Al-Dakheel, Ibrahem, A., & Ibrahem, R. (1993). Behavioral therapy for students, methods and models, a world of knowledge, Kuwait.
- Al-Khateeb, J. (2003). *Modify the behavior of students with disabilities, parents and teachers guide,* Al-Falah library, Al Ain.
- Al-Rosan, F. (2001). Abnormal students psychology, introduction to special education, (5th ed.). Dar Al-Ifeker for printing, publishing, and distribution, Amman.
- Al-Sabah, S. (1993). *Social withdrawal among people with disabilities*, unpublished Master Thesis, Faculty of Education, University of Jordan.
- Al-Zarad, F. (2001). Attention deficit and hyperactive disorder and students behavior impulsivity, diagnosis and treatment, family and teacher guide, Sharjah city for humanitarian services publications, Sharjah.

- Anastasiow, N., Gallagher, J., & Kirk, S. (2003). *Educating exceptional students*, Tenth Edition, Houghton Mifflin Company, Boston, New York.
- Beblawi, I., & Khudair, M. (2004). *Visually impaired*, Arab Academy for Special Education, Riyadh.
- Brubaker, R., & Szakowski, A. (2000). Parenting practices and behavior problems among deaf students. *Child & Family Behavior Therapy*, 22(4), 13-28.
- Cornish, K., & Ross, M. (2002). A survey of the prevalence of stereotypy, self-injury and aggression in students and young adults with Cri du Chat syndrome, *Journal of Intellectual Disability Research*. 46(2), 133-140.
- Davies-Mackenzie, N., & Mansell, J. (2007). Assessment and treatment units for people with intellectual disabilities and challenging behavior in England: An Exploratory Survey, *Journal of Intellectual Disability Research*, *51*(10), 802-811.
- Frank, C.V., Hans, M. K., Karen, P. R., & Marielle, C.D. (2007). Developmental course of psychopathology in youths with and without intellectual disabilities, *Journal of Child Psychology and Psychiatry* 48(5), 498–507.
- Frank, C. V., Hans, M. K., Jolanda, C. D., Karen, P. R., & Marielle C. D. (2008). Development of parent-and teacher-reported emotional and behavioral problems in young people with intellectual disabilities: Does level of intellectual disability matter? *Journal of Applied Research in Intellectual Disabilities*, 21, 70–80.
- Hastings, R. P., Lewis, S., Toogood, S., & Totsika, V. (2008). Persistence of challenging behaviors in Adults with intellectual disability over a period of 11 Years, *Journal of Intellectual Disability Research*, 52(5), 446-457.
- Hogue. T. E., Lindsay. W. R., Mooney. P.; Morrissey. C., Steptoe. L., S., & Taylor. J. (2007). Emotional and behavioral problems in offenders with intellectual disability: comparative data from three forensic services, *Journal of Intellectual Disability Research*, *51* (10), 778–785.
- Jaffal, A. (1994). *Non-adaptive behaviors among the hearing impaired*, unpublished Master Thesis, Faculty of Education, University of Jordan.
- Salha, S. (2007). Behavioral and emotional problems for the visually impaired individuals and its relationship to variables: the cause and level of visual disability, age, gender, unpublished Master Thesis, Faculty of Graduate Studies, University of Jordan.
- Samreen, S. (January, 2003). *Deaf in the Arab world, their rights, their needs, their situation*, The Third Forum of the Gulf Association for disability, Doha.
- Tuma, J. (1989). Mental health services for students: The state of the art. *American Psychologist*, 44, 188-199.