

Common Behavioral Problems among Preschool Children as Perceived by their Teachers

EmanElsayedAbdalla⁽¹⁾, Amal Mohamed EL-Dakhakhny⁽²⁾&Bataa Mahmoud Mohamed⁽³⁾

⁽¹⁾Demonstrator pediatric nursing department-,Faculty of nursing- Zagazig university,⁽²⁾ prof. of pediatric nursing- Faculty of nursing- Zagazig university,⁽³⁾Lecturerof pediatric nursing- Faculty of Nursing -Zagazig university

Abstract

Background: Behavioral problems among preschool children are a global problem of significant public importance that adversely affects on children's social and emotional challenges throughout their lifetime. **Aim of the study:**was to assess the common behavioral problems among the preschool children as perceived by theirteachers.**Subjects& Methods:Research design:**A descriptive analytical design was used. **Setting:** four Nursery Schools and kindergartens in Zagazig city where selected randomly. **Subjects:** preschool children (170)and their teachers who coped with them. **Tools of data collection:**Two tools were used for collecting data in the study; the first tool was an interviewquestionnaire for children's caregivers as (parents). The second tool was Teacher Report Form which used to determine behavioral problems among preschool children.**Results:** Results revealed that more than one fifth (20.6%) of the studied children hadexternalizing behavioral problems while internalizing behavioral problems were less common (8.20%). Anxiety / depression and aggressive behaviors followed by attention problems and withdrawn behaviors were the most common behavioral problems among preschool children.**Conclusion:**behavior problems among preschool children are a problem encountered in nursery schools and kindergartens.**Recommendations:**Early screening system for behavioral problems among preschool children should be done in kindergartens and nursery schools.

Keywords: Preschool Children, behavioral problems, Teacher's perception.

Introduction:

The preschool period includes ages three to less than six years old. This is a period of significant growth and development as children's maturing physical, cognitive, and social skills give way to an increasing understanding of themselves and the world around them .Yet, this stage of development is also characterized by behavioral problems, as parents and teachers across cultures typically report relatively high rates of it ⁽¹⁾.

Moreover, children begin to assert their power and control over the world through directing play and other social interaction. Children need to begin asserting control and power over the environment. During this stage, it is important for caregivers to encourage exploration and to help children make appropriate choices. Caregivers who are discouraging or dismissive may cause children to feel ashamed of

themselves and to become overly dependent upon the help of others. So that focus on this age group is important because of their influential state of mind later ⁽²⁾.

Some misbehavior is a normal part of childhood development. Often, children test rules and boundaries by misbehaving in order to discover what caregivers will and will not allow. In some cases, behavioral problems are a symptom of an underlying problem. Normally children often become irritable and moody when they are tired or hungry. Other stressor that can cause behavior problem in preschool children include problem at home or issues in child care environment. Children who are exposed to tension and fighting between their parents or between parents and an older child often feel confused and frightened, sometimes leading to misbehavior ⁽³⁾.

studies added that behavior and emotional problems are of particular concern in the preschool age group as once established they often persist throughout childhood and adolescence and, in some cases, continue into young adulthood⁽⁴⁾. The prevalence rates of these problems vary between 10% and 20% because the differences of studies in estimating these problems is due to the limitations of diagnostic tools used to classify problem behavior. The World Health Organization (WHO) has reported a prevalence rate for mental health problems among preschool children in developing countries is more than 5 to 15%⁽⁵⁾.

Because behavior problems among preschool children are common they are important targets for intervention because early externalizing problems and self-regulation issues tend to persist without appropriate attention, and can affect later mental health and school achievement outcomes⁽⁶⁾.

Thus, identifying early childhood behavior problems is critically important for understanding and preventing the development of problems later in life⁽⁷⁾.

studied added that behavioral problems are important determinants of school outcomes and later success in the labor market⁽⁸⁾.

The relationships between preschool children and their teachers are an important component of the quality of the preschool experience. Teacher-child relationships take on particular importance in preschool settings. Preschool teachers are often the first significant non-family adult with whom the child forms an ongoing relationship. Preschool teachers play the role of both caregiver and educator. They are providing the child with his or her first group learning experience and setting the stage for the child's future success or failure in the school setting⁽⁹⁾.

The American Academy of Pediatrics (AAP) has reported an

increase in pediatric patients with mental health needs seen in primary care. AAP has recommended enhancing school-based mental health services provided by school nurses and advanced practice in preschools services to address the mental health needs of children⁽¹⁰⁾.

Nurses should be informed about their ethical and legal responsibilities concerning behavioral problems during preschool. Examination protocols should be provided about behavioral problems in preschooler. This information is important, because it will help in formulating new approaches and preventive strategies to curtail this problem⁽¹¹⁾.

Furthermore, clinical implications for nurses for the identification of behavior problems in preschool children should be discussed⁽¹²⁾.

Significance of the Study:

Childhood behavior problems represent an important topic in developmental psychopathology. Internalizing behavior problems in early childhood are risk factors for teenage and adult depression, anxiety, and suicide, while externalizing behavior problems are risk factors for later juvenile delinquency, adult crime, and violence.

Aim of the study:

The present study aimed to assess common behavioral problems among preschool children as perceived by their teachers.

Research Questions:

1. What are the common behavioral problems among preschool children as perceived by teachers?
2. What are the mental problems associated with behavioral problems among studied preschool children?

Subjects and methods:

Research design:

Descriptive Analytical design was used.

Study setting:

The study was conducted at two kindergartens & two nursery Schools at Zagazig city. Tolba Ewada, Sheba kindergarten ,Eltefl Elsaïd nursery school&Elwafaa nursery school

Study subjects:**▪ Preschool children**

170 Preschool children and their parents or caregivers who attended the previously mentioned settings. Total number amounted to 170 parents for children who fulfill the following criteria constituted the sample:

- Age: from 3-6 years.

▪ Their Teachers

Teachers who coped with children at the previously mentioned settings were included. Their total number was 20 teachers who fulfill the following criteria:

- Teachers were coping with children at least 3 months.
- a) Elwafaa nursery school at abo elakhdar village included 3 teachers
 - b) Eltefl Elsaïd nursery school at Zagazig city included 9 teachers
 - c) TolbaEwada kindergartens at Zagazig city included 5 teachers

Tools of data collection:

Two tools were used to collect the necessary data:

Tool I: An interview questionnaire

An interview questionnaire was developed by researcher which consisted of this part: Characteristics of the Studied Children It included socio-demographic data such as child's age, sex, birth order, and residence, as well as crowding index and family type of the child.

Tool II: Teacher- Report Form (TRF).

Teacher report form was developed by Achenbach & Rescorla⁽¹³⁾ adapted & translated into Arabic by the researcher. It was divided into two parts:

Part I: Characteristics of Teachers

It included general characteristics of teachers such as age, years of

experiences, qualifications and training courses about child behavioral problems.

Part II: Behavioral Problems Report scale

It was used to determine behavioral problems among preschool children according to the perception of teachers. The scale enabled assessment of the behavioral problems by the teachers of preschool children. It consisted of 99 items representing the most common behavioral problems. The responses are on a three point scale: never, sometimes, and usually. The items were categorized into the following subscales:

- Internalizing behavioral problems subscale: included behavioral problems such as emotionally reactive (7items), anxious/depressed (8items), somatic complaints (7items), and withdrawn (10 items).
- Externalizing behavioral problems subscale: included behavioral problems such as aggressive behavior (25items), attention problems(9 items)
- Other behavioral problems subscale: included 33 items for behavioral problems such as overactive ,lying and cheating ,fear of new and others problems

Scale also enabled assessment of five mental problems according Diagnostic and Statistical manual of Mental disorders (DSM) which included

- Affective Problems (Depressive Problems)
- Anxiety Problems
- Pervasive Developmental Problems (Autism Spectrum Problems)
- Attention Deficit hyperactivity problems

- Oppositional Defiant Problems

Scoring system:

Scoring: the responses are scored for zero for never, one for sometimes, and two for usually.

The responses of each part were summed together. Then, scores of each part were summed to calculate the total score.

The scores transformed into score percent as the following:

Score % = (the observed score / the maximum score) x 100
Then score % was transferred into categories as follow: Normal: For those who had a score less than 60%
Abnormal: For those who had a score more than 60 %.

Content Validity and reliability:

The tools were tested, by using content and construct validity for clarity, relevance, applicability, understanding, comprehensiveness, and ease for implementation by taking the opinions of five experts; from different branches as (two professor of mental health and one professor of psychology at the Faculty of Education, Professor of Mental Health Nursing & Professor of Pediatrics Nursing, Faculty of Nursing). Reliability of tool was done using Cronbach's Alpha test reliability coefficient to measure the internal consistency for the final scales.

- the reliability of behavioral problems report scale
- The reliability of aggressive behavioral problems scale was 0.935 .
- The reliability of attention behavioral problems scale was 0.862
- The reliability of emotional reactive behavioral problems scale was 0.716
- The reliability of anxious /depressed behavioral problems scale was 0.857
- The reliability of somatic complaints behavioral problems scale was 0.700

- The reliability of withdrawn behavioral problems scale was 0.882
- The reliability of other behavioral problems scale was 0.831

Field work:

Data collection took a period of eight months from July 2015 to February 2016. After receiving the official permission, the pilot testing of the study tools was conducted and analyzed.

For parents of the studied children, researcher started data collection when caregivers of studied children come back for their children & the questionnaire sheet tool was completed in 5 minutes. For teachers of the studied children, the researcher interviewed the teachers and explained the purpose of the study, and obtained their verbal consent. Each teacher was individually interviewed, and the behavioral problems teacher-report form was completed in 20 to 25 minutes.

Pilot study:

A pilot study was conducted on 10% of the studied preschool children and interviewed with their teacher and caregivers at study setting to assess the applicability, clarity, the estimated time needed for each sheet to be finished and the feasibility of the study and acceptance to be involved in the study.

Administrative and ethical considerations:

All ethical issues were taken into consideration during all phases of the study: The research approval was obtained from the ethical committee before starting the study. The researcher maintained the anonymity and confidentiality of the subjects. The inclusion in the study was totally voluntary. The aim of the study was explained to every teachers & caregivers of children before participation and an oral consent was

obtained. Subjects were notified that they can withdraw at any stage of the research; also they were assured that the information obtained during the study would be confidential and used for the research purpose only. Official permissions were obtained from the Education Directorate at Zagazig based on letters from the faculty of nursing explaining the aim and procedures of the study. General Director referred the researcher to the directors of selected nursery schools & kindergartens with approved letters. Then the researcher met with each of them and explained the aim of the study and the nature of tools used for data collection. The researcher gave the director of each nursery schools & kindergartens a copy of the tool.

Statistical analysis:

Data collected were analyzed by computer using the statistical package for social sciences (SPSS) software version 20. Mean and standard deviation, median and percentages were used for data summarization. Mont Carlo exact test and Fishers exact test that is used to test for the relationship between the categories of variables (row and column variables) to reflect a real relationship between these 2 variables in the population.

Results:

Table (1) represents characteristics of the studied children. Regarding age, it was found that 35.3% of the studied children were in the age group 3 years and 35.3% in the age group 5 to 6 years, with mean age of 4.1 ± 0.8 years. As well as boys represented 57.6% of studied children. Concerning birth order, it was found that 42.9% of the studied children were the first born child. Also it was shown that 57.1% of preschool children had two siblings. As regards to children's residence, the results revealed that 68.2% were from rural areas. The same table also showed that 7.6% and 0.6% of preschool children were in one parent family (divorced and dead) respectively.

Table (2) represents characteristics of teachers who had coped with the studied children. Regarding age, it was found that 65% of preschool children's teachers were in the age group 25 to <30 years and with mean age of 29.1 ± 3.0 years. Concerning years of experience, 60.0% children's teachers had experience years between 1 to < 4 years, and 15% had experience years 5 to < 10 years, with mean experience of 2.8 ± 3.1 years. The same table also reported that 100% of teachers were graduated from university while 65% never attended any training courses about children behavioral problems.

Figure (1) illustrates behavioral problems among studied preschool children. The results revealed that 20.6% of studied children had abnormal externalizing behavioral problems but abnormal internalizing behavior problems were 8.2%. Only 1.2% of studied children had other behavior problems. While the total behavior problems of studied preschool children were 17.6%.

Figure (2) illustrates internalizing and externalizing behavioral problems of studied children. It was found that 18.8% of studied children had aggressive behavior problems. In addition, 17.6% had attention problems. While 21.2% had anxiety/depression and 15.3% had withdrawal.

Table (3) represents other behavioral problems of the studied children. The results revealed that 46.5% of studied children were usually overactive. In addition, 21.8% were also overactive sometimes. While only 8.8% were underactive children.

It was reported that 35.9% of studied children were lying or cheating usually and 19.4% were lying or cheating sometimes. While 44.7% were never lying or cheating.

It was reported that 43.5% of studied children were explosive sometimes and also 43.5% were getting hurt sometimes.

It was found that 42.9% of studied children were getting teased by other children sometimes. While only 5.9% were afraid of new usually. In addition, 41.2% were sometimes afraid of new.

Figure (3) illustrates mental problems according DSM among studied preschool children. The results revealed that 12.9 % of studied children had attention deficit hyperactivity problems. It was found that 13.5% had oppositional defiant problems .While 2.9% had affective problems (depressive problems).

Concerning anxiety problems, it was found that 7.6 % of studied children had anxiety problems. While only 2.4 % had pervasive developmental problems (Autism Spectrum Problems).

Table (4) illustrates the relationship between children's gender and behavioral problems. It was found that there was statistically significant relationship between gender and internalizing behavior problems (FEP =0.008).Meanwhile 6.9% of studied children who had abnormal internalizing behavior problems were girls compared to 0.0% boys.Also, it was found that there was no statistically significant relationship between children's gender and behavioral problems as externalizing behavior problems & other behavior problems.

Table (5) clarifies relationship between characteristics of children and total behavioral problems scale. It was found that there was statistical significant relationship between age and total behavioral problems scale (P =0.002), where 31.7% of children who aged 3-4 years had abnormal total behavioral problems as when the children's age increased , the abnormal total behavioral problems become less.

Regarding child's birth order, results revealed that 28.8% of children who had abnormal total behavioral

problems were the first born children and the results showed statistically significant difference (P=0.011) in addition to statistical significant relation between number of children at family and total behavioral problems scale (P= 0.008)

Also, It was found that there was statistical significant relationship between crowding index and total behavioral problems scale(P= 0.001),meanwhile 31.6% of children who had abnormal total behavior problems had high crowding index more than 1 in their homes. This means that where the crowding index was increased, the behavioral problems of children become more. In relation to gender, it was found that 20.4% of boys compared to 13.9% of girls had abnormal total behavioral problems. In spite of this there was no statistically significant relation was found between total behavioral problems scale and children's gender.It is also revealed from the same table that there was no statistical significant relation between children's residence and total behavioral problems scale. Concerning residence of children 17.2% of children were from rural areas compared to 18.5% were from urban areas had abnormal total behavioral problems.

Discussion:

The present study showed that total behavior problems of studied preschool children were 17.6%. This result is matched with Santos et al⁽¹⁴⁾ who conducted a study about assessment and analysis for teacher's report of preschool behavior problems in Denmark and reported that the prevalence of behavioral problems falls within the range 12% to 29% in developing countries. While, Henriksen et al.⁽¹⁵⁾ in a study to assess and analysis of parent- reported problems in a population-based sample of Danish preschool children and found that 23 % of studied children had total

behavior problems as reported by mothers. This variation in the percentage of total behavioral problems as reported by mothers and teachers could be due to mothers exaggerated some misbehaviors as well as their perception and expectation is different than actual child behavior. While the teachers had the opportunity to compare child's behavior with that of his classmates in addition to the fact that preschool teachers typically have more experience directly observing behavior of the child in different situation inside and outside the class.

In relation to externalizing behavioral problems among studied children, the present study found that more than one fifth (20.6%) of the studied children had externalizing behavioral problems which included aggressive behavior problems and attention problems. This result goes in line with Samarakkody et al.⁽¹⁶⁾ who conducted a study to estimate the prevalence of externalizing behavior problems in Sri Lankan preschool children and found that the prevalence of externalizing behavior problems was estimated as 19.4%. As well as Boraey & El-Sonbaty⁽¹⁷⁾, who conducted a study to assess behavioral problems in children with and without nephrotic syndrome and found that total externalizing behavior problems were 16.7% of children without nephrotic syndrome. Externalizing behavioral problems were more common during preschool age, because children have a greater tendency to express their emotions and react to stresses through greater impulsivity and misbehavior. On the contrary only 2.5% of Kosovar preschool children had externalizing behavioral problems in a study conducted by Shala & Dharmo⁽¹⁸⁾.

The current study showed that aggressive behavior was the most common behavioral problem among studied preschool children (18.8%) of studied preschool children. This finding was in agreement with previous studies

which reported that childhood aggression was a major public health problem worldwide especially in recent years. In the United States the prevalence of aggression between preschool age children was 22% Seven et al.⁽¹⁹⁾ Moreover Amin et al.⁽²⁰⁾ in a study to estimate the prevalence and factors associated with aggression among preschool age children in Al-Asher 10th of Ramadan city (Egypt) revealed that the overall prevalence of preschool age children who were always suffering from aggression was 32%.

Concerning attention problems, Mahone & Schneider⁽²¹⁾ reported that inattention among preschool children represented a most often normal variation in typical preschool child development. While the current study found that 17.6% of studied children had attention problems. This result goes in line with Meysamie et al.⁽²²⁾ who found the same percentage of attention problems among preschool-aged Iranian children. Thus, the best accurate identification of attention problems is through teachers report because they can easily observe his concentration ratio through preschool work in class in addition to their ability for following the lesson instructions.

On the other hand, internalizing behavioral problems among studied children were the least common behavioral problems; the present study showed that 8.2% of studied children had internalizing behavioral problems. The present study was supported by Tendon et al.⁽²³⁾ who conducted a study to evaluate internalizing problems in early childhood and illustrated that internalizing disorders tend to be viewed as less problematic by parents or teachers and other caregivers. This may be related to the fact that such disorders were most often characterized by quiet, internal distress sometimes referred to as "intro-punitive," rather than overtly, socially negative, or disruptive

behavior. Such features may also make these disorders more difficult to detect in the very young who have less well-developed verbal skills in general and specifically an even more limited capacity to describe internal feeling states.

In addition to Ginige et al.⁽²⁴⁾ who conducted a study to estimate the prevalence of behavioral and emotional problems among children in Sri Lanka and clarified that 8% of children showed internalizing problems.

Meanwhile, anxious/ depression and withdrawal problems were the most common internalizing behavioral problems of studied children where more than one fifth of the studied children were anxious depressed and 15.3% were withdrawn. This is contradicted with Pourhossein et al.⁽²⁵⁾ who conducted a study to assess of behavioral disorders among preschool children as reported by mothers in Tehran(Iran), the study showed that anxiety/ depression and withdrawal problems (6.7&5.7% respectively) were the least common internalizing behavioral problems of studied children. This contradictory related to mother's report masked this behavioral problem due to mothers who are anxious depressed or withdrawn see these symptoms as normal between their children. Saadon⁽²⁶⁾ reported that somatic complaints were the least common behavioral problem among preschool children. This matches with the result of the current study where only 1.2% of studied preschool children had somatic complaints. Moreover, Schroeder & Ollendick⁽²⁷⁾ added that the incidence of the somatic complaints among child from 3 to 6 years old is relatively decreased but increased during school age and adolescent.

The results of the present study revealed that more than half of studied children were usually and sometimes

overactive (46.5% & 21.8%) respectively, Robey-Williams⁽²⁸⁾ was in agreement with these results and found that more than half of preschool children were overactive. High percentage of overactive behavior related to that preschool children are normally moving and playing more than old children and cannot keep calm without movement for long period and this represent problems for adult either the teachers or parents when want their child to keep calm . So that teachers and parents reported overactive behavior of their preschool children a lot.

Hays & Carver⁽²⁹⁾ reported that lying among preschool children was more than half of children and preschool age is the peak of lying during childhood. This finding goes in line with result of the present study where lying among studied preschool was more than half of children where 35.9 % and 19.4% of children were lying usually and sometimes. This may be due to children are still learning right from wrong and children will lie when confronted about something they are doing wrong. Also, children of this age have big imaginations and love to embellish stories with creative details. They are still learning to tell the difference between real and false. Mental problems of the studied preschool children

Mental problems in childhood, such as ADHD and oppositional defiant problems are common, with an incidence 12% for each problem during childhood. While, in developing countries the incidence is higher Merikangas et al.⁽³⁰⁾. Similarly, the current study showed that ADHD and oppositional defiant problems are the most common mental problems among preschool children where 12.9 % of studied children had the criteria of attention deficit hyperactivity problems and 13.5% had the criteria of oppositional defiant problems

according to DSM as reported by their teachers.

In addition to teachers are often the first ones to recognize or suspect ADHD in children. That's because ADHD symptomatically affects preschool performance or disrupts the rest of the class. Also, teachers are with children for most of the day and for months out of the year. Since teachers work with many different children, they also come to know how students typically behave in classroom situations requiring concentration and self-control. So when they notice something outside the norm, they may speak with the parents about their concerns Tannock & Chabanm⁽³¹⁾.

Moreover, our results also go in line with El Nemr et al.⁽³²⁾ who carried out a study to determine the prevalence of ADHD and associated risk factors among children in Menoufia Governorate (Egypt) and they found that the incidence of ADHD was high among preschool children and the study revealed that the prevalence of probable ADHD was 19.7%.

The present study revealed that about 2.4% of studied children had the criteria of pervasive developmental disorders (Autistic spectrum problem) according to DSM. This is in agreement with previous study conducted by Elbahaey et al.⁽³³⁾ in Egypt to assess Egyptian children with autism spectrum disorders and risk factors in relation to disease severity, and they found that Autistic spectrum disorders (ASDs) or pervasive developmental disorders are more common than previous and have prevalence of 1–2.6% in child. No clear data could explain the dramatic worldwide increase in the incidence of ASD during the last two decades and it is suggested that some environmental factors besides a genetic predisposition leads to this disease.

Concerning the age of studied children, the results of the present study showed that a mean age was 4.1 ± 0.8 years. This is supported by Dyson et al.⁽³⁴⁾ who found that the majority of preschool children were at the age group from 3 to 4.5 years. Also, UNESCO⁽³⁵⁾ in a past study about early childhood care and education (ECCE) programmes in Egypt and they found that the majority of preschool children who enrolled in preprimary school education were at the age group from 5-6 years.

The result of current study indicates that there was a statistical significant relation between age of preschool children and their total behavioral problems ($P = 0.002$), where 31.7% of children who aged 3-4 years had abnormal total behavioral problems and only one fifth of children who aged 4-6 years had abnormal total behavioral problems. Similarly, Acton⁽³⁶⁾ found that there was a statistical significant relation between age and behavioral problems. As when the children's age increased, the abnormal total behavior problems become less.

The present study revealed that more than one third of the studied children had crowding index in their homes about 2-4 person per rooms. This finding was in agreement with previous studies reported that a crowding index was high in Egypt Mansour et al.⁽³⁷⁾ who found that 44, 18% of preparatory school children had crowding index about 3-5 person /rooms). Moreover Fahmy & Abd El Rahman⁽³⁸⁾ who conduct a study about determinants and health consequences of domestic violence among women in reproductive age in Zagazig found that 59.6 % of studied population had crowding index more than 1.5 person per rooms.

Also, it was found that there was a statistical significant relationship between crowding index and total behavioral problems ($P = 0.001$), where

more than one fourth of children who had abnormal total behavior problems had crowding index more than 1-2 person per rooms in their homes.

This matches with the study conducted by Solari & Mare⁽³⁹⁾ to assess effect of crowding house and children wellbeing who added that living in crowded housing conditions can create stress in the home and have negative behaviors for its inhabitants. Children may be particularly affected by living in crowded house because they use the space in the home to do homework, interact with family members, develop an identity, practice skills, and sleep.

In relation to child's birth order, the present study showed that there was statistical significant relationship between child order and total behavioral problems ($P=0.044$). Our results were similar to Cundiff⁽⁴⁰⁾ who reported that there was statistical significant difference between children's behavior according to their birth orders. Because the family is the first social system to which a child is exposed, child order inside the family plays a substantial role in a child's behavior and personality. Moreover, Marleau et al⁽⁴¹⁾ added that first-born child had more behavior problems than second-born children but second-born children had more positive interactions with their mothers and others (as teachers) than first-born children.

Conclusion:

Based upon the findings of the present study, it was concluded that behavior problems among preschool children were a problem encountered in nursery schools and kindergartens as rated by their teachers. In addition, total behavior problems of preschool children were 17.6% and

externalizing behavior problems were more common than internalizing behavior problems. Moreover anxiety / depression and aggressive behaviors followed by attention problems and withdrawn behaviors were the most common behavioral problems among preschool children as reported by their teachers. While, oppositional defiant problems and attention deficit hyperactivity problems were the most common mental problems among preschool children.

Recommendations:

In the light of the findings of the current study, the following recommendations are suggested:

- Establishing a system for accurate monitoring and documentation of behavioral problems among preschool children in nursery schools and kindergartens should be done.
- A constructive and therapeutic environment should be maintained in nursery schools and kindergartens to decrease the potential for behavioral problems through providing therapeutic child-teacher relationship with the emphasis on active listening and expressing the feelings.
- Management training program for teachers and caregivers should be conducted about behavioral problems
- Prospective studies are needed to confirm the efficacy of training program for teachers and caregivers to decrease behavior problems among preschool children, as well as identifying of the best therapeutic program to decrease behavior problems.

▪ **Table (1): Characteristics of the Studied Children (No=170)**

Characteristics	No (170)	%
Age (years)		
• 3 -	60	35.3%
• 4 -	50	29.4%
• 5-6	60	35.3%
Mean ± SD	4.1 ± 0.8	
Gender		
▪ Boy	98	57.6%
▪ Girl	72	42.4%
Residence		
▪ Rural	116	68.2%
▪ Urban	54	31.8%
Child order		
▪ 1 st	73	42.9%
▪ 2 nd	78	45.9%
▪ 3 rd	18	10.6%
▪ 4th/more	1	.6%
Children at family		
▪ One	17	10.0%
▪ Two	97	57.1%
▪ Three	46	27.1%
▪ Four/more	10	5.9%
Crowding index		
▪ 1-	113	66.5%
▪ 2-4	57	33.5%
Type of family		
▪ Both parents	150	88.2%
▪ One parent (Divorced)	13	7.6%
▪ One parent (Dead)	1	0.6%
▪ Others	6	3.5%

▪ **Table (2): Characteristics of the Teachers of Studied Children(No=20)**

Teachers characteristics		No(20)	%
Children's teachers			
Age (years)			
▪ 25-		13	65%
▪ 30-40		7	35%
Mean ± SD		29.1 ± 3.0	
Qualification			
▪ University		20	100%
Experience years			
▪ <1 year		5	25%
▪ 1-4		12	60.0%
▪ 5-10		3	15%
Mean ± SD		2.8 ± 3.1	
Have Training courses about child behavioral problems			
▪ Yes		7	35%
▪ No		13	65%
Training courses			
▪ Inside nursery school		6	85.7%
▪ Outside nursery school		1	14.3%

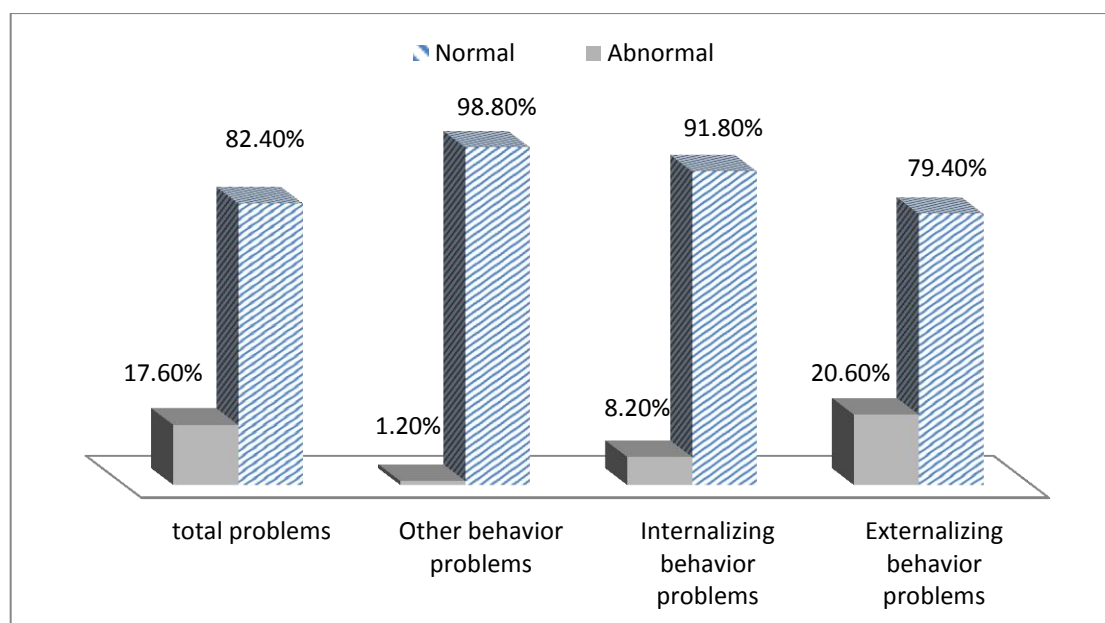


Fig (1): Behavioral Problems of the Studied Children

Other behavior items	Never		Sometimes		Usually	
	No	%	No	%	No	%
Afraid Of New	90	52.9%	70	41.2%	10	5.9%
Chew Non food	82	48.2%	79	46.5%	9	5.3%
Seeks Help	86	50.6%	69	40.6%	15	8.8%
Cries a lot	96	56.5%	59	34.7%	15	8.8%
Not Get Along with other children	104	61.2%	61	35.9%	5	2.9%
No Fun	117	68.8%	44	25.9%	9	5.3%
Jealous	86	50.6%	57	33.5%	27	15.9%
Eat Non Food	122	71.8%	39	22.9%	9	5.3%
Fear	121	71.2%	45	26.5%	4	2.4%
Getting Hurt	90	52.9%	74	43.5%	6	3.5%
Getting Into Things	88	51.8%	64	37.6%	18	10.6%
Explosive	74	43.5%	74	43.5%	22	12.9%
Hold Breath	145	85.3%	22	12.9%	3	1.8%
Fear of nursery School	87	51.2%	69	40.6%	14	8.2%
Overtired	93	54.7%	65	38.2%	12	7.1%
Getting Teased by other children	77	45.3%	73	42.9%	20	11.8%

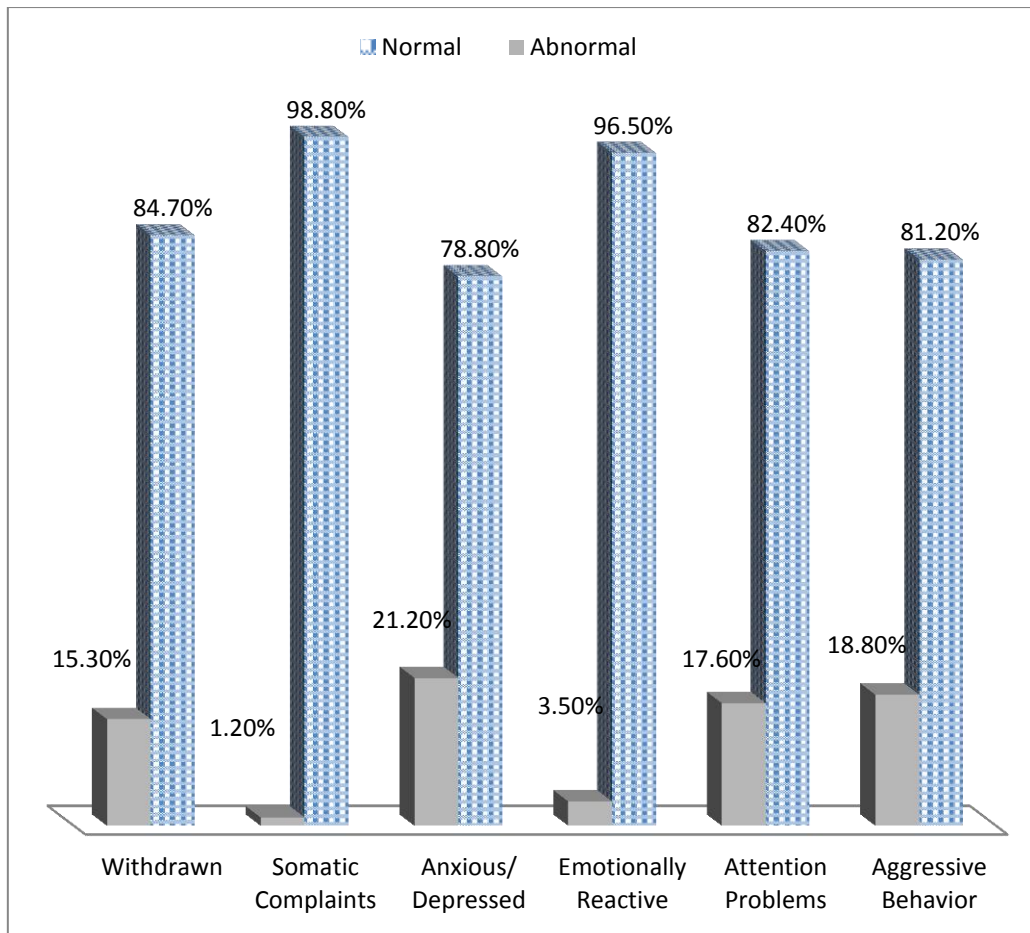


Fig (2): Internalizing and Externalizing Behavioral Problems of Studied Children

Table (3):Other Behavioral Problems of Studied Children

Other behavior items	Never		Sometimes		Usually	
	No	%	No	%	No	%
Playing sex parts	106	62.4%	54	31.8%	10	5.9%
Eye Problem without medical cause	153	90.0%	17	10.0%	0	0.0%
Skin Problem without medical cause	166	97.6%	2	1.2%	2	1.2%
Refusing Eat	93	54.7%	58	34.1%	19	11.2%
Repeatedly rocks head or body	123	72.4%	32	18.8%	15	8.8%
Lying or cheating.	76	44.7%	33	19.4%	61	35.9%
Little Fear	99	58.2%	55	32.4%	16	9.4%
Too shy	70	41.2%	64	37.6%	36	21.2%
Overactive	54	31.8%	37	21.8%	79	46.5%
Speech problem	100	58.8%	40	23.5%	30	17.6%
Staring into space	117	68.8%	45	26.5%	8	4.7%
Over conforming to rules	82	48.2%	56	32.9%	32	18.8%
Strange behavior	112	65.9%	55	32.4%	3	1.8%
Underactive	103	60.6%	52	30.6%	15	8.8%
Loud	105	61.8%	58	34.1%	7	4.1%
Unclean personal appearance	136	80.0%	33	19.4%	1	.6%

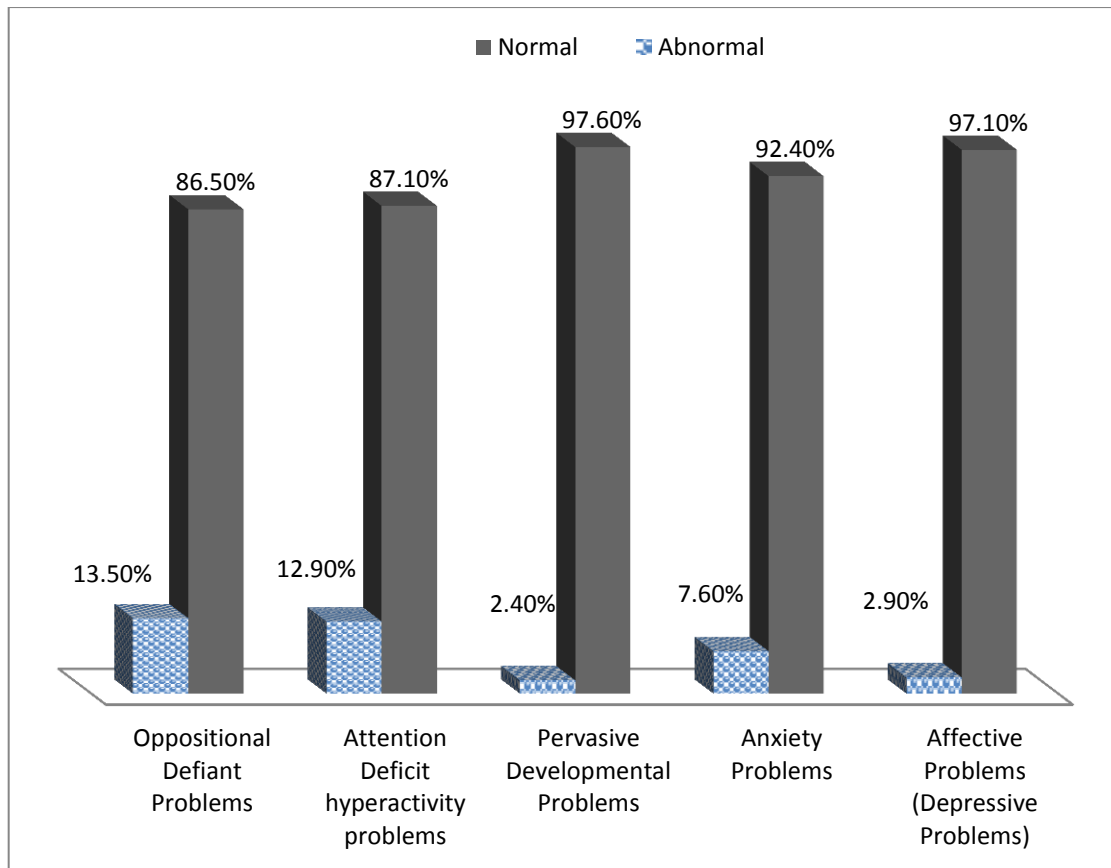


Fig (3): Mental Problems of the Studied Children

Table (4): Relationship between Children's Gender and Behavioral Problems

Problems	Gender				FEP
	Boy		Girl		
	No	%	No	%	
Aggressive Behavior					0.071
▪ Normal	75	76.5%	63	87.5%	
▪ Abnormal	23	23.5%	9	12.5%	
Attention Problems					0.774
▪ Normal	80	81.6%	60	83.3%	
▪ Abnormal	18	18.4%	12	16.7%	
Externalizing behavior problems					0.194
▪ Normal	80	81.6%	64	88.9%	
▪ Abnormal	18	18.4%	8	11.1%	
Emotionally Reactive					0.700
▪ Normal	95	96.9%	69	95.8%	
▪ Abnormal	3	3.1%	3	4.2%	
Anxious/ Depressed					0.775
▪ Normal	78	79.6%	56	77.8%	
▪ Abnormal	20	20.4%	16	22.2%	
Somatic Complaints					0.097
▪ Normal	98	100.0%	70	97.2%	
▪ Abnormal	0	0.0%	2	2.8%	
Withdrawn					0.670
▪ Normal	84	85.7%	60	83.3%	
▪ Abnormal	14	14.3%	12	16.7%	
Internalizing behavior problems					0.008*
▪ Normal	98	100.0%	67	93.1%	
▪ Abnormal	0	0.0%	5	6.9%	
Other behavior problems					0.223
▪ Normal	96	98.0%	72	100.0%	
▪ Abnormal	2	2.0%	0	0.0%	

FEP: Fisher exact probability * P < 0.05 (significant)

Table (5): Relationship between Characteristics of Studied Children and Total Behavioral Problems Scale

Child's Characteristics	Total behavior problems scale				MCP	
	Normal		Abnormal			
	No	%	No	%		
Age (years)	3-	41	68.3%	19	31.7%	0.002*
	4-	45	90.0%	5	10.0%	
	5-6	54	90.0%	6	10.0%	
Gender	Boy	78	79.6%	20	20.4%	0.271
	Girl	62	86.1%	10	13.9%	
Residence	Rural	96	82.8%	20	17.2%	0.839
	Urban	44	81.5%	10	18.5%	
Child order	1 st	52	71.2%	21	28.8%	0.011*
	2 nd	70	89.7%	8	10.3%	
	3 rd	17	94.4%	1	5.6%	
	4th/more	1	100.0%	0	0.0%	
Number of Children at family	One	9	52.9%	8	47.1%	0.008*
	Two	84	86.6%	13	13.4%	
	Three	38	82.6%	8	17.4%	
	Four/more	9	90.0%	1	10.0%	
Crowding index	1-	101	89.4%	12	10.6%	0.001*
	2-4	39	68.4%	18	31.6%	

- MCP: Mont Carlo exact probability
- P < 0.05 (significant)

References:

1. Babcock JK: Identifying Risk and Protective Factors Associated with the Relationship between Developmental Delays and Behavior Problems In an Urban Sample of Preschool Children. Available at: <http://search.proquest.com>. Accessed February 27 ,2016.
2. Cherry K: Initiative Versus Guilt Stage Three of Psychosocial Development. Available at: <http://psychology.about.com>. Accessed October 27 ,2016 .
3. Wood L: Behavior Problems in preschool Children. Available at: <http://www.livestrong.com/reference/articale/behavioral-problem-in-preschool-children> .Accessed March 16, 2016.
4. Cornforth CM , Thompson JMD, Robinson E , Waldie KE, Pryor JE , Clark P .,et al:Children born small for gestational age are not at special risk for—485.
5. Pourhossein R, Habibi M, Ashoori A, Ghanbari N, Riahi Y, Ghodrati S: Prevalence of behavioral preschool emotion and behavior problems. *Early Human Development*. (2012),88 (12) 479disorders among preschool children.*Journal of Fundamentals of Mental Health*. 2015, 17(5) 234-39.
6. Upshur C : A Pilot Study of a Primary Prevention Curriculum to Address Preschool Behavior Problems. *Journal of primary prevention*. (2013), 34 (5)309-27.
7. Liu J, Cheng H and Leung PWL: The Application of the Preschool Child Behavior Checklist and the Caregiver–Teacher Report Form to Mainland Chinese Children: Syndrome Structure, Gender Differences, Country Effects, and Inter-Informant Agreement.*Journal of Abnormal Child Psychology*. (2011), 39(2) 251–264.
8. Kristoffersen JHG & Smith N:Gender Differences in the Effects of Behavioral Problems on School Outcomes. Available at: <http://ftp.iza.org>.Accessed March20, 2016.
9. Dobbs J& Arnold D: The Relationship between Preschool Teachers' Reports of Children's Behavior and Their Behavior Toward Those Children .Available at: <http://www.ncbi.nlm.nih.gov> . AccessedMach 26,2016
10. Shepherd SB:The Role of School Nurses in the Early Identification, Referral and Provision of Services for Students with Early Signs of Mental, Emotional or Behavioral Disorders. Available at:<http://search.proquest.com>. Accessed February 27 ,2016.
11. Swan J and Hamilton PM: Mental Health Crisis Management. Available at: <https://wildirismedicaleducation.com>. Accessed (March 6,2014).
12. Cabaj JL, McDonald SW & Tough SC. Early childhood risk and resilience factors for behavioral and emotional problems in middle childhood. Available at: <https://www.ncbi.nlm.nih.gov>. Accessed October 5,2014.
13. Achenbach T and Rescorla L: Achenbach System of Empirically Based Assessment. Available at: <http://link.springer.com>. Accessed April 26, 2016.
14. Santos LM, Fernanda C, Queiro S, MaurícioL , Barreto& Darci N: Prevalence of behavior problems and associated factors in preschool children. *Rev Bras Psiquiater*.2016, 38(1)46-52.
15. Henriksen TB, Kristensen S, Bilenberg N: The Child Behavior Checklist for

- ages 1.5–5(CBCL/1½–5): Assessment and analysis of parent- and caregiver-reported problems in a population-based sample of Danish preschool children. *Nord J Psychiatry.* (2010), 64(1)203-209.
16. Samarakkody D , Fernando D , McClure R , Perera H, De Silva H :Prevalence of externalizing behavior problems in Sri Lankan preschool children.*Soc Psychiatry PsychiatrEpidemiol .*(2012), 47 (2) 757–762.
 17. Boraey NF & El-Sonbaty M:Behavioral Problems In Children With &Without Nephrotic Syndrome.*Journal of Applied Sciences Research.* 2011, 7(12) 2001-2007
 18. Shala M &Dhamo M:Prevalence of Behavioural and Emotional Problems among Two to Five Years Old KosovarPreschool Children. 2013,4(12) 1008-1013
 19. Seven S, Gulay H &Damar M: Assessing the relationship between aggression tendencies and the secure parental attachment of children going through early adolescence. *World Applied SciencesJournal*;2011,13(3)404-409
 20. Amin FM ,Behalik SG & El SoreetyWH:Prevalence and Factors Associated with Aggression among Preschool Age Children at Baraem Bader Nursery School in Al-Asher 10th of Ramadan city, Egypt. *Life Science Journal*;2011,8(4):929-938.
 21. Mahone EM&Schneider HE: Assessment of attention in preschoolers. *Neuropsychology Rev.*2012, 22(4)361-83.
 22. Meysamie A, Fard MD &Mohammadi MR: Prevalence of Attention Deficit/Hyperactivity Disorder Symptoms in Preschool-aged Iranian Children. *Iranian Journal of Pediatrics.*2011, 21(4) 467–472.
 23. Tandon M, Cardeli E &Luby J:Internalizing Disorders in Early Childhood: A Review of Depressive and Anxiety Disorders. *Child and Adolescent Psychiatric Clinics of North America*;2009, 18(3) 593–610.
 24. Ginige P, Tennakoon SU, Wijesinghe WH, Liyanage L , Herath PS&Bandara K: Prevalence of behavioral and emotional problems among children in selected schools in Kandy District, Sri Lanka. Available at: <http://www.jadjournal.com>. Accessed December 15, 2016.
 25. Pourhossein R, Habibi M, Ashoori A, Ghanbari N, Riahi Y&Ghodrati S: Prevalence of behavioral disorders among preschool children. *Journal of Fundamentals of Mental Health*;2015, 17(5)234-39.
 26. Saadon M: Common behavioral problems among preschool children as perceived by mothers and teachers. Un Published Master Thesis (2012), faculty of nursing, Port Said University
 27. Schroeder CS &Ollendick TH: recurrent abdominal pain. In: *Encyclopedia of Clinical Child and Pediatric Psychology*, 2nd ed. Springer Science & Business Media., New York. (2012) P: 542.
 28. Robey-Williams CR: Early Screening and Identification of Preschool Children Affected by Serious Emotional Disorders. Available at: <http://scholarcommons.sc.edu>. Accessed December 15, 2016.
 29. Hays C and Carver LJ : Follow the liar: the effects of adult lies on children's honesty. *Developmental Science*;2014, 17(6)977–983.
 30. Merikangas KR, He JP, Brody D, Fisher PW, Bourdon K&Koretz DS: Prevalence and treatment of mental disorders among US children.*Pediatrics*;(2010), 125(1)75-81.

31. Tannock R&Chaban R: Teachers' Role in the Diagnosis of ADHD . Available at: <http://www.aboutkidshealth>. Accessed at (December 25, 2016).
32. El-Nemr FM, Badr HS, Salem MS: Prevalence of Attention Deficit Hyperactivity Disorder in Children .Science Journal of Public Health.2015, 3(2) 274-280.
33. Elbahaey WA, Elkholy MH, Tobar SS& El-BoraieH : Egyptian children with autism spectrum disorders: risk factors and co morbidity in relation to disease severity. Egypt J Psychiatry;2016, 37(2)59-69.
34. Dyson MW,Klein DN,Olino TM,Dougherty LR&Durbin CE:Social and Non-Social Behavioral Inhibition in Preschool-Age Children: Differential Associations with Parent-Reports of Temperament and Anxiety.Child Psychiatry Human Developments;2011, 42(4) 390–405.
35. UNESCO:Egypt Early Childhood Care and Education (ECCE) programmes. Available at: <http://unesdoc.unesco.org/>.pdf Accessed December 25, 2016.
36. Acton A :Prader-Willi Syndrome: New Insights for the Healthcare Professional, Scholarly Editions., Georgia. (2012) P: 8.
37. Mansour AE ,Yasein YA, Ghandour A, Zaidan O, Mohamed M. El-Abaas MM:Prevalence of bronchial asthma and its impact on the cognitive functions and academic achievement among preparatory school children in Damietta Governorate, Egypt. Journal of American Science;2014, 10(7)119-127.
38. Fahmy HH & Abd El Rahman S: Determinants and Health Consequences of Domestic Violence Among Women in Reproductive Age at Zagazig District, Egypt. Egypt Public Health Assoc; 2008, 83 (2)1-20.
39. Solari CD & Mare RD :Housing Crowding Effect On Children's Welling. Social Science Research;2012, 41(2) 464–476.
40. Cundiff PR : Ordered Delinquency: The “Effects” of Birth Order On Delinquency. Personality & Social Psychology Bulletin;2013, 39(8) 1017–1029.
41. Marleau JD, Saucier JF&Allaire JF: Birth order, behavioral problems, and the mother-child relationship in siblings aged 4 to 11 years from a 2-child family. Can J Psychiatry.2006, 51(13)855-63.