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# Assessment of Mental Health Problems among Deaf and Mute Adolescents

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***Abstract:*** **Deaf and mute adolescents suffer from psychological stress, depression, anxiety, low self -esteem and lack of psychological services provided for them. Aim: the study aims to assess mental health problems and services of deaf and mute adolescents. Design: A descriptive correlational design was utilized in the current study.Sample: Aconvenient purposive sample (n =200 deaf and mute adolescents). Setting: the study was conducted at El Amal deaf and mute school in Lebanon Square. Data collection tools: Socio demographic data sheet, manifest anxiety scale, stress scale, psychological needs scale, self -esteem scale, Beck depression scale psychological services scale. Main results: Deaf and mute adolescents suffer from high level of (anxiety, depression and psychological stress), and moderate level of psychological services which provided for them. Also represented that, there was positive significant relation between anxiety and psychological stress (p=.002), there was positive significant relation between depression and anxiety (p=.0001), there was positive significant relation between depression and psychological stress (p=.0001), there was positive significant relation between self-esteem and satisfaction of psychological needs (p=.005) and there was negative significant relation between depression and satisfaction of psychological needs. Conclusion: Mental health problems of deaf and mute adolescents might be increased due to limit special psychological foundation for them, and sign language is not familiar for all medical team. Recommendations: The study recommended that presence of an interpreter of sign language in all psychiatric clinics to decrease their mental health problems.**

***Keywords:*** **mental health problems, mental health services, deaf and mute adolescents.**

## 1. INTRODUCTION

Adolescent is the period of transition from adolescenthood to adulthood. This transition is time of rapid change in body ,emotion ,attitudes ,values ,intellectual abilities and relationship with the family and peers .during this period of change the main goals of adolescent include learning about new body with new potential for feelings, and behaviors making an initial separation from the family to begin an independent identity and defining his or her place in adult society [1].

Hearing is one of the most vital senses due to individual depend on it in his interactions with others during the different life situations, it helps him to recognize surrounding environment , can alert of any coming danger around him and individual can co-exist with others by it so that hearing disabilities consider from more and more difficult sensory disabilities that affect humans, lead to lost the ability to speak so that speech , learning different life skills or acquisition of language are difficult for deaf adolescent [2]. Although language plays a central role in individual development. It helps in internalizing social norms, development of behavioral control and facilitates communication between the individuals. Communication process have important role in connection between the individuals and the environment surrounding them and it enhance their understanding and relationships between each other. Deaf adolesents feel with social isolation due to their inability to understand any auditory stimuli surrounding them [3].

Consequently adolescent with hearing loss are at risk of developing psychopathology, which has detrimental consequences for psychosocial functioning in their life and encounter cognitive, communicative, emotional, practical and social problems beyond those experienced by people who have their hearing. This may rise the risk of hearing loss adolescent to developing mental health problems such as (isolation, anxiety and depression). They may give up their interests and their activities and this can impact on their psychological wellbeing [1].

Deaf adolescents face extra problems resulting from his/her disability such as distrust in itself, unequal competition with others , inability to express his feelings, inability to communicate, failing to satisfy their needs ,low self -esteem ,deficit, and social isolation and his/her disability effect on identity ,quality of life ,emotional wellbeing of adolescent [3]. So that we should provide them with all types of care and attention to communicate with them to feel their humanity regardless lack of their abilities. Deaf adolescents are the more people need to enjoy with appropriate compatibility profile such as internal equilibrium, sense of satisfaction, self-confidence, ability to satisfy their needs, self-reliance, overcome on feelings of pain and deficiency caused by disability [2]. Despite deaf adolescents need to social support from others, and professional help from many specialists. Family play an important role in improve sociality of deaf adolescent and integrating him/her into the community by avoiding rejection , neglecting of him ,integration him into the family, acceptance and balanced dealing with him [3].

Early detection, early diagnosis & timely intervention with appropriate support from the family and community is the key to management of deaf adolescent [4]. Hearing screening programs for adolescent can successfully identify hearing loss soon after its onset and limiting its adverse impact [5]. Early identification and early intervention services help deaf adolescent to minimize developmental delays, facilitate communication, education and social development. Early intervention team consists of educational audiologists, speech pathologists ,teachers of the deaf, support workers and parent support groups. Families and adolescent have the opportunity to engage in individual and/or group activities which promote the adolescent's language, cognitive, social ,emotional, and physical development. Communication opportunities are offered in both spoken and signed language [6].

**Significance of the study:**

Deafness can influence physical and mental health and social well-being of adolescents and might result in low self-esteem, irritability, isolation, disappointment, depression and anxiety and emotional and social problems [7]. The prevalence of hearing impairment in adolescent is more than 1.7% while up to 7% of adults suffer from it (including 183 million men and 145 million women) [8].

Azab, Kamel&Abdelrhman (2015) revealed that one adolescent per 1,000 adolescent are deaf or have hearing impaired from birth, and the number rises to about 1.6 per 1,000 in adolescents [9].

Prevalence of hearing loss in Egypt was estimated at (16.02%) ,Marsa Matrouh had the highest prevalence of hearing loss (25.7%) and North Sinai had the lowest prevalence of hearing loss (13.5%) by national household survey in 2006 to estimate prevalence of hearing loss in Egypt in 6 region (Alexandria, Dakahlia, Luxor, Marsa Matrouh, Minia and North Sinai), it is higher than prevalence of hearing loss in many other countries ,developing countries such as United States ,prevalence of hearing loss in it was (9.6%) , in Indonesia was (4.6%) ,in Sri Lanka was (8.8%) ,and in Arab countries such as in Oman was (5.53%) and in Saudi Arabia was (13%). Prevalence of hearing loss in school adolescent at 2007-2008 was estimated at 5.3% in Alexandria, 4.5% in rural areas and 13.7% in Ismailia governorate [10]. Numbers of deaf and mute schools in Egypt at 2009-2010 were 263 school and numbers of the deaf and mute students in these schools were 14063 student [11].

Deafness influence on adolescent development, it lead to delay in language communication , and social development, and develop emotional, behavioral problems and lead to increase risks for mental health problems [12] . Prevalence of mental health problems among deaf adolescent is 2-3 times higher than among their hearing peers [13]. Rates of emotional and behavioral problems in deaf adolescent are about two times higher than hearing adolescent [14] . Deaf adolescent are more vulnerable than other adolescent to emotional, sexual and physical abuse due to their communication difficulties which lead to inability to describe and report about their experience, lack of awareness for adolescent regarding sexuality and personal safety and most of hearing people is not understand sign language [15]. The low status of deaf and mute individuals in Egyptian society and their suffering from a lot of social and psychological problems resulting from society's perception of them not for their disability. Deaf and mute adolescents suffer from lack of psychological, social and health care services especially early detection services for them compared with hearing adolescents [16].

This study plays an important role in practice and increase the body of knowledge of the psychiatric and mental health nurses as regards the concepts included in the study. Because the deaf and mute adolescents suffer from plenty of mental health problems, few in psychiatric nurse specialist and mental health services provided for them and they need specialized personnel for effectively communicate through the sign language to discover the hidden suffering of the sector throughout transitional period. Therefore the need for psychiatric nurse specialist is crucial for providing comprehensive nursing care for deaf and mute adolescents and cope with their mental health problems.

**Aim of this study**

The study aims to assess mental health problems and services among deaf and mute adolescents.

**Operational definitions**

1. Mental health problems: are social isolation, depression, low self-esteem and anxiety which will be measured by anxiety manifest scale, self -esteem scale, depression scale and stress scale.

2. Mental health services: are mean the facilities and services provided to deal with the mental health status of the deaf and mute which is/ are provided through the inpatient or outpatient clinics or through the mental health unit at the school.it will assess the qualifications of the personnel existence of psychologist, psychiatrist or mental health nurse which will be measured by services of deaf and mute adolescent scale.

**Research questions**

Q1-What are the anxiety among deaf and mute adolescents?

Q2-What are the levels of stress among deaf and mute adolescents?

Q3-What are the mental health services among deaf and mute adolescents?

**Research design**

Descriptive correlational design was utilized for this study. This type of research design is appropriate to the current study as the researchers collected the data from the subjects at one-time meeting without changing any of the subjects‟ behavior or perception [17]

**Sample**

A convenience sample of 200 deaf and mute adolescents selected for the conduction of the current study. Inclusion criteria for this sample were deaf and mute both gender, age from 13-19 years, can read and write, adolescent with mental retardation were excluded from the study

**Setting**

This study was carried out in El Amal deaf and mute adolescents school.

**Tools of data collection**

Data were collected over a period of 7 months from September 2016 till March 2o17 by using socio demographic data sheet , Manifest anxiety scale, stress scale, psychological needs scale , Self -esteem scale ,Beck depression scale and services scale.

1. ***Socio demographic data sheet***

It was developed by the investigator, including two parts; the first part was about the adolescent's information. as regards age, gender, and study year, number of family member, family illness history and reasons of illness. Second part, including parent's information regards age, educational level and occupation.

2. ***Manifest anxiety scale (MAS)*** [18]

It was designed to assess anxiety level, contains 50 items and responses were measured by two rating answer (yes/no) ,in which yes =1 and No=0 . the total score is the sum of all items, the total score range from (0-50). The total score is divided as follows : 0-16 = No anxiety , 17-20 = mild degree of anxiety , 21-26 =moderate degree of anxiety, 27-29 = severe degree of anxiety , 30-50 = very and severe degree of anxiety.

***3. Psychological needs scale*** [19].

It was designed to assess psychological needs of deaf and mute adolescents, it contains 36 items (Arabic version). it It contains 4 domains are (communication needs, emotional needs, social needs and educational rehabilitative needs). communication needs domain contains 8 items , emotional needs domain contains 8 items ,social needs domain contains 9 items and educational rehabilitative domain contains 11 items .the scale rated on a 3-points Likert scale from 1-3 (permanent=3, some- times=2, rarely =1 ) the total scoring system ranges from 0-108 . Total score were divided as follows: 36 = low level of satisfaction of psychological needs, 37-72 = moderate level of satisfaction of psychological needs and 73-108 = high level of satisfaction of psychological needs.

***4. Stress scale*** [19].

It was designed to assess stress level among deaf and mute adolescents. The scale contains 41 items (Arabic version). It contains 4 domains (family stress, school stress, future stress, emotional stress).family stress domain contains 7 items, school stress domain contains 12 items, future stress domain contains 10 items, and emotional stress domain contains 10 items .the scale rated on 3-points Likert scale from 1 - 3 (high=3, moderate=2, low=1).the total scoring system ranges from 0-123. Total score were divided as follows: 0-41 = low level of stress, 42-82 = moderate level of stress and 83-123 = high level of stress.

5-**Beck depression scale** [20]

It was designed to measure depression level among adolescents and adults, it contains 21 items each category describe specific behavioral manifestation of depression and consists of graded series of four or five self -evaluative statements. The statement are ranked by order and weighted to reflect the range of severity of the symptom from neutral to maximum severity. Numerical values of zero, one, two three or four. The total scoring system ranges from 0-63 .total score were divided as follows: 0-9 = no depression, 10-15 = mild depression, 16-23 = moderate depression, 17-36 = severe depression and 37 or above = very severe depression.

***6. Psychological services scale***

The scale was developed by the researcher, it designed to assess psychological services of deaf and mute adolescents.it contains 12 items on two rating answer (find /not find), in which find=1, not find =0 and two essay questions .reliability were tested (0.92). The total scoring system ranges from 0-12 .total score were divided as follow 0-4 =low psychological services, 5-8 =mild psychological services and 9-12 =high psychological services.

***7. Self -esteem scale (***Kamel, 2003) [21].

It designed to assess self-esteem among deaf and mute adolescents, It contains 20 items. it contains 2 domains (self-esteem and self -esteem from others).self -esteem domain contains 10 items, and self -esteem from others domain contains 10 items. The scale rated on a 3-points Likert scale from 0-2 (permanent=2, some- times=1, never=0) . The total scoring system ranges from 0-40 .total score were divided as follows: 0-12 = low self –esteem, 13-26 = moderate self-esteem and 27-40 = high self -esteem

**Ethical consideration**

A primary approval was obtained in May 2016 to conduct the current study from the ethical committee of faculty of nursing ,Cairo university, an official permission was obtained from Central Agency for Public Mobilization and Statistics in August 2016, permission of Directors of Education, Giza in August 2016, Department of Education in Agouza in September 2016, and director of El Amal deaf and mute school in Lebanon square. All participants were informed about the purpose and benefits of the study and that the researcher is master candidate at the faculty of nursing ,Cairo university. All subjects' were informed that participation in the current study is voluntary, no names were included in the questionnaire sheet and anonymity and confidentiality of each participant was protected by the allocation of a code number for each response to the questionnaire. subjects were informed that, they can withdraw at any time during the study without giving reasons. Their withdrawal would not affect the care they were receiving and relationship with the investigator. Confidentiality was assured and subjects were informed that the content of the tool would be used for the research purposes only. Final approval was obtained from the faculty of nursing, Cairo university ethical committee after completion of the data collection.

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**Procedure**

A review of the past, current Arabic and English related literature covering various aspects of the problem was done, using available books, articles, periodicals and magazines to get acquainted with the research problem and develop the study tools. The investigator used and followed the translation procedure for verifying the translation of the tools. The investigator translated the instruments (English formats) into Arabic language, rendered the same English formats to bilingual experts for more verification of the translation of the Arabic formats. The resulting versions were translated back into original language by other bilingual experts. Minor descriptions in the content were founded and necessary modifications were done.

Each student was interviewed individually after explaining the purpose of the interview and getting agreement of the student supported with teacher from this school to collect the required data included in socio demographic data sheet, manifest anxiety scale, stress scale for adolescent deaf and mute, depression scale ,self -esteem scale, and psychological needs scale, the student read the sheet and when he or she did not understand any question the teacher explained it for him or her preceded by the teacher in the presence of investigator for more clarification. Interview with each participant took about 30 minutes.

**Pilot Study:**

The questionnaire was used on a sample equal to 10% of the total sample size that were not part of the main study. No further modification was done to the scale.

**Statistical Analysis:**

Data were analyzed using Statistical Package for Social Study (SPSS) version 20. Descriptive statistics including number and percentages were used for qualitative variables and mean and standard deviation were used for quantitative data. Correlation coefficient and multiple regression were used to answer the current research questions. Relation between different measures was computed via Pearson‟s correlation coefficient. The level of the significance in this study was (<0.05), and (<0.01) considered highy significant.

**Presentation and Data Analysis**

Part I Socio-demographic characteristics of the studied sample.

As can be seen from table (1) and figure (1) the studied sample consisted of 200 deaf and mute adolescent. More than half of them (50.5%) were female, also the study results shows that 50% of them aged between $13^{th}$ to $16^{th}$ years old and 50% aged between $17^{th}$ to $19^{th}$ years old. Moreover table (1) illustrates that 50% of them are students between $7^{th}$ of primary school to $2^{nd}$ year of preparatory school and 50% of deaf and mute students between $3^{rd}$ year of preparatory school and $3^{rd}$ year of secondary school.

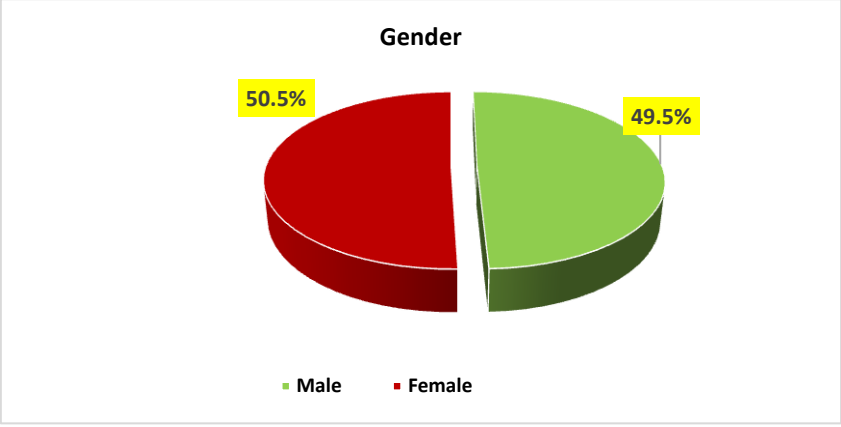


**Figure (1): frequency Distribution of the studied sample according to the gender (n=200)**

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**Table (1): frequency Distribution of the studied sample according to sociodemographic characteristics (n=200)**

| Items | No | % |
|---|---|---|
| **Age** | | |
| - 13- years old | 50 | 25 |
| - 14- years old | 50 | 25 |
| - 16-years old | 51 | 25.5 |
| - 18-19 years old | 49 | 24.5 |
| **Study years** | | |
| - $7^{th}$ &$8^{th}$ primary school | 50 | 25 |
| - $1^{st}$ &$2^{nd}$ preparatory school | 50 | 25 |
| - 3rd prep school &1st secondary school | 51 | 25.5 |
| - $2^{nd}$ &$3^{rd}$ secondary school | 49 | 24.5 |

Table (2) reveales that, the majority family size of studied sample 43% consisted of five persons, and more thatn half of them were the first adolescent in order, as regard history that majority of studied sample (69.5%) had family history of deafness and mute, while (29.5%) of studied sample did not have family history of deafness and mute. As regard the reason of illness the study result indicates that, nearly two third of the studied sample (66.5%) caused by hereditary reason and one third of studied sample (33.5%) caused by illness and accident.

**Table (2): frequency Distribution of the studied sample according to sociodemographic characteristics (n=200)**

| Items | No | % |
|---|---|---|
| **Family size** | | |
| - Three persons | 8 | 4 |
| - Four persons | 62 | 31 |
| - Five persons | 86 | 43 |
| - Six person | 44 | 22 |
| **Order in family** | | |
| - First | 104 | 52 |
| - Second | 78 | 39 |
| - Third | 18 | 9 |
| **Family history for deaf and mute** | | |
| - No history | 59 | 29.5 |
| - History of one person | 91 | 45.5 |
| - History of two persons | 31 | 15.5 |
| - History of three persons | 19 | 9.5 |
| **Reasone for illness** | | |
| - Heredity | 133 | 66.5 |
| - Illness | 24 | 12 |
| - Accident | 43 | 21.5 |

Table (3) shows that, (41%, and 42%)of the studies sample father and mother were illiterate respectively, while (59%, and 58%) of their father and mother respectively their educational level varies from read and write to university education.

**Table (3).frequency Distribution of the studied sample according to father and mother education (n=200) .**

| Items | Father educatin | | Mother educatin | |
|---|---|---|---|---|
| | No | % | No | % |
| Illiterate | 82 | 41 | 84 | 42 |
| Can read and write | 26 | 13 | 22 | 11 |
| Primary school education | 28 | 14 | 22 | 11 |
| Preprtory school education | 25 | 12.5 | 25 | 12 |
| Secondaryschool education | 30 | 15 | 37 | 18.5 |
| University education | 9 | 4.5 | 10 | 5 |

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Table (4): Reports that there is no statistically significant differences between gender of the studied sample and psychological variables (anxiety, depression, psychological needs ,psychological pressure, psychological services and self -esteem scores)

**Table (4): comparison between gender and the studied scales (n=200).**

| Items | Gender | | F-value | P-value |
|---|---|---|---|---|
| | Male | female | | |
| | Mean+SD | Mean+SD | | |
| Anxiety level | 28.31+4.95 | 29.09+12.45 | 0.577 | .565 |
| Psychological needs scale | 82.98+8.82 | 82.26+8.08 | 0.604 | .546 |
| Psychological stress scale | 85.03+12.80 | 86.52+11.11 | 0.882 | .379 |
| Depression scale | 20.49+8.16 | 21.83+7.69 | 1.192 | .235 |
| Psychological services scale | 5.01+0.10 | 5.00+0.00 | 1.010 | .314 |
| Self -esteem scale | 20.24+6.68 | 21.41+7.25 | 1.180 | .239 |

As regards, age of the studied sample, table (5) shows that, there are highly statistically significant difference between adolescent's age and psychological stress where F=3.48 at P= 0.017, moreover , there are highly statistically significant difference between age of the studied sample and self-steem where F=3.68 at P= 0.013.

**Table (5): comparison between age and the studied scales (n=200).**

| Variables | Age | | | | F-value | P-value |
|---|---|---|---|---|---|---|
| | 13-14 | 14-16 | 16-18 | 18-20 | | |
| | Mean+SD | Mean+SD | Mean+SD | Mean+SD | | |
| Anxiety level | 29.68+16.73 | 27.08+5.30 | 28.35+5.47 | 29.73+4.81 | .878 | .453 |
| Psychological needs | 81.76+7.77 | 84.62+9.59 | 83.63+7.85 | 80.39+8.02 | 2.554 | .057 |
| Psychological stress | 89.84+10.06 | 83.66+12.55 | 83.12+12.16 | 86.59+12.08 | 3.482 | .017* |
| Depression level | 20.34+6.41 | 20.34+9.36 | 21.37+8.10 | 22.65+7.58 | .946 | .420 |
| Psychological services | 5.00+0.00 | 5.00+0.00 | 5.00+0.00 | 5.02+0.14 | 1.028 | .381 |
| Self-esteem | 19.62+6.07 | 23.42+6.86 | 20.90+7.99 | 19.35+6.24 | 3.680 | .013* |

Significant level at $p \leq 0.05$

Table (6) Reports that, there is no statistically significant differences between family size and psychological variables (anxiety ,depression, psychological needs ,psychological pressure, psychological services and self-esteem scores)

**Table (6): Comparison between family size of studied sample and psychological variables(n=200).**

| Variables | Family size | | | | F-value | P-Value |
|---|---|---|---|---|---|---|
| | Three persons | Four persons | Five persons | Six persons | | |
| | Mean+SD | Mean+SD | Mean+SD | Mean+SD | | |
| Anxiety level | 28.25+3.45 | 28.70+5.77 | 28.60+13.23 | 29.00+5.00 | .023 | .995 |
| Psychological needs level | 81.25+8.53 | 83.908.41 | 83.04+8.66 | 80.20+7.74 | 1.851 | .139 |
| Psychological stress level | 84.38+9.90 | 86.44+12.65 | 85.13+12.39 | 86.36+10.71 | .217 | .884 |
| Depression | 18.88+6.62 | 22.89+8.22 | 19.86+8.33 | 21.66+6.52 | 2.071 | .105 |
| Psychological services | 5.00+0.00 | 5.00+0.00 | 5.01+0.11 | 5.00+0.00 | .447 | .720 |
| Self-esteem | 21.13+4.58 | 21.70+7.31 | 20.47+7.08 | 20.23+6.71 | .511 | .675 |

It is clear from table (7) that there is no statistically significant differences between history of family illness of studied sample and psychological variables (anxiety , depression, psychological needs ,psychological pressure, psychological services and self -esteem scores).

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**Table (7): comparison between family illness histories of studied sample and psychological varibles (n=200).**

| Variables | History of Family illness | | | | F-value | P-value |
|---|---|---|---|---|---|---|
| | No history | One person | Two persons | Three persons | | |
| | Mean±SD | Mean±SD | Mean±SD | Mean±SD | | |
| Anxiety scale | 31.14± 15.33 | 28.02±4.99 | 27.39±5.90 | 26.58±5.24 | 1.992 | .116 |
| Psychological needs scale | 82.92±9.16 | 82.43±7.49 | 83.16±8.34 | 81.68±10.89 | .158 | .924 |
| Psychological stress scale | 87.47±10.93 | 84.87±11.76 | 87.26±12.02 | 82.53±15.46 | 1.199 | .311 |
| Depression scale | 23.19±8.08 | 20.44±7.59 | 21.16±7.79 | 18.42±8.51 | 2.333 | .075 |
| Psychological services scale | 5.00±0.00 | 5.00±0.00 | 5.03±0.18 | 5.00±0.00 | 1.840 | .141 |
| Self -esteem scale | 20.86±6.81 | 20.12±7.17 | 22.42±7.28 | 21.53±5.98 | 0.912 | .436 |

Table (8) Reveals that, there were highly statistically significant differences between reasons of illness and anxiety level among the studied sample where, F= 5.208 at P=0.006. Also, there are highly statistically significant difference between reason of illness and depression among the studied sample wher F= 4.472 at P = .013.

**Table (8): comparison between reasons of illness of studied sample and psychological variables(n=200).**

| Variables | Reasons of illness | | | F-value | p-value |
|---|---|---|---|---|---|
| | Hereditary | Accident | Illness | | |
| | Mean±SD | Mean±SD | Mean± | | |
| Anxiety level | 27.52±5.28 | 29.37±5.35 | 34.08±22.99 | 5.208 | .006* |
| Psychological needs | 82.53±8.22 | 83.19±7.98 | 82.04±10.55 | .159 | .853 |
| Psychological stress | 85.19±12.33 | 85.40±10.44 | 89.79±12.22 | 1.541 | .217 |
| Depression | 20.00±7.53 | 23.42±8.65 | 23.63±7.71 | 4.472 | .013* |
| Psychological services | 5.01±0.09 | 5.00±0.00 | 5.00±0.00 | .250 | .779 |
| Self-esteem | 20.81±7.14 | 21.23±6.80 | 20.21±6.59 | .166 | .847 |

Significant level at p≤ 0.05

It is clear from table (9) that, there were highly statistically significant differences between father age and anxiety level among the studied sample where, F= 3.485 at P=0.033. Also, there were highly statistically significant differences between father age and psychological stress among the studied sample where, F= 3.518 at P=0.032.

**Table (9 ): comparison between father age of studied sample and psychological variables(n=200).**

| Variables | Father age | | | F-value | p-value |
|---|---|---|---|---|---|
| | 30-39 years old | 40-49years old | 50-59 years old | | |
| | Mean±SD | Mean±SD | Mean±SD | | |
| Anxiety level | 27.51±5.04 | 27.67±5.19 | 31.55±15.38 | 3.485 | .033* |
| Psychological needs | 83.77±9.92 | 82.98±7.92 | 81.09±8.21 | 1.367 | .257 |
| Psychological stress | 82.56±13.96 | 85.32±10.78 | 88.96±12.11 | 3.518 | .032* |
| Depression | 20.46±7.80 | 20.75±8.39 | 22.49±7.05 | 1.070 | .345 |
| Psychological services | 5.00±0.00 | 5.00±0.00 | 5.02±0.13 | 1.322 | .269 |
| Self -esteem | 20.87±6.11 | 21.43±7.03 | 19.64±7.41 | 1.205 | .302 |

Significant level at p≤ 0.05

Table (10) Reveals that there were highly significant differences between mother age of studied sample and psychological stress where F=4.375 at P = .014.

**Table (10): comparison between mother age of studied sample and psychological variables(n=200).**

| Variables | Mother age | | | F-value | p-value |
|---|---|---|---|---|---|
| | 30-39 years | 40-49 years | 50-59 years | | |
| | Mean±SD | Mean±SD | Mean± SD | | |
| Anxiety level | 27.72±5.21 | 29.20±11.81 | 29.35±5.86 | .561 | .571 |
| Psychological needs | 83.71±9.42 | 81.81±8.03 | 83.30±6.82 | 1.153 | .318 |
| Psychological stress | 84.19±13.15 | 85.49±11.03 | 92.95±10.69 | 4.375 | .014* |
| Depression | 21.88±8.65 | 20.32±7.58 | 23.45±6.84 | 1.763 | .174 |
| Psychological services | 5.00±0.00 | 5.01±0.09 | 5.00±0.00 | .398 | .672 |
| Self -esteem | 20.61±5.93 | 21.54±7.42 | 17.65±7.21 | 2.734 | .067 |

Significant level at p≤ 0.05

It is clear from table (11) that, there were highly significant differences between mother job and psychological stress where F= 7.412 at P= 0.001.

**Table ( 11): comparison between mother job of studied sample and psychological variables(n=200).**

| Variables | Mother job | | | F-value | p-value |
|---|---|---|---|---|---|
| | No work | Employee | Free work | | |
| | Mean±SD | Mean±SD | Mean±SD | | |
| Anxiety | 29.14±11.09 | 27.82±5.40 | 27.90±4.95 | .399 | .672 |
| Psychological needs | 82.87±8.18 | 81.46±9.02 | 82.58±9.00 | .319 | .727 |
| Psychological stress | 86.57±12.17 | 86.11±12.49 | 82.98±10.76 | 1.400 | .249 |
| Depression | 22.66±7.67 | 18.86±7.93 | 17.88±7.59 | 7.412 | .001* |
| Psychological services | 5.01±0.09 | 5.00±0.00 | 5.00±0.00 | .256 | .775 |
| Self -esteem | 20.97±7.00 | 21.00±7.28 | 20.25±6.85 | .171 | .843 |

Significant level at p≤ 0.05

Table(12) Reports that there is no statistically significant differences between and father educational level of studied sample and psychological variables (anxiety ,depression, psychological needs ,psychological pressure, psychological services and self -esteem scores).

**Table (12 ): comparison between father education of studied sample and psychological variables(n=200).**

| Items | **Father educational leval** | | | | | F-value | p-value |
|---|---|---|---|---|---|---|---|
| | Illiterate | Read and write | Primary | High school | College | | |
| | Mean±SD | Mean±SD | Mean±SD | Mean±SD | Mean±SD | | |
| Anxiety | 29.11±13.5 | 28.27±6.82 | 27.79±5.36 | 28.90±4.50 | 26.78±3.42 | .187 | .967 |
| Psychological needs | 83.11±8.14 | 80.23±10.9 | 83.43±9.25 | 81.03±6.71 | 84.67±7.2 | .925 | .466 |
| Psychological stress | 86.20±11.3 | 84.46±14.3 | 85.79±13.5 | 85.90±11.7 | 83.89±10.0 | .137 | .984 |
| Depression | 20.94±7.26 | 21.92±9.49 | 19.18±7.07 | 23.70±7.45 | 19.33±9.27 | 1.12 | .348 |
| Psychological services | 5.01±0.11 | 5.00±0.00 | 5.00±0.00 | 5.00±0.00 | 5.00±0.00 | .283 | .922 |
| Self-esteem | 21.11±7.43 | 21.69±7.02 | 22.46±7.00 | 19.07±7.13 | 18.11±6.55 | 1.10 | .360 |

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Table(13) Reports that there is no statistically significant differences between mother educational level of studied sample and psychological variables (anxiety ,depression, psychological needs ,psychological pressure, psychological services and self -esteem scores)

**Table (13): correlation between mother education of studied sample and psychological variables(n=200).**

| Items | Mother educational **leval** | | | | | F-value | p-value |
|---|---|---|---|---|---|---|---|
| | Illiterate | Read and write | Primary | High school | College | | |
| | Mean±SD | Mean±SD | Mean±SD | Mean±SD | Mean±SD | | |
| Anxiety scale | 28.69±13.3 | 28.14±5.06 | 28.91±5.21 | 29.14±6.62 | 27.70±4.60 | .055 | .998 |
| Psychological needs | 83.17±9.07 | 83.45±7.89 | 80.82±7.88 | 82.22±9.64 | 83.50±5.56 | .390 | .856 |
| Psychological stress | 85.13±12.1 | 86.59±11.1 | 87.77±12.2 | 84.35±11.9 | 89.90±10.8 | .529 | .754 |
| Depression scale | 20.60±7.28 | 21.73±6.27 | 17.91±8.96 | 22.68±9.01 | 23.10±7.53 | 1.38 | .231 |
| Psychological services | 5.01±0.11 | 5.00±0.00 | 5.00±0.00 | 5.00±0.00 | 5.00±0.00 | .271 | .928 |
| Self -esteem | 20.94±7.12 | 20.32±5.89 | 18.91±5.78 | 22.00±6.70 | 17.40±6.31 | 1.26 | .281 |

As can seen from table (14-a) and (14-b) that there were highly statistically significant correlation between anxiety, and psychological stress and depression where r=(0.2, and 0.25) at P= (0.002, an 0.001) respectively. Also there were statistically significantcorrelation between psychological needs and depression and self-estem where r= (0.16, and 0.19) at p = (0.02, and 0.005) respectively, moreover there are higly significant correlation between psychological stress and depression where e = 0.28 at p= 0.0001.

**Table (14-a): correlation between psychological variables (anxiety ,depression, psychological needs ,psychological pressure, psychological services and self -esteem scores)**

| **Variables** | **Anxiety** | | **Psychological needs** | | **Psychological stress** | |
|---|---|---|---|---|---|---|
| | **r** | **p-value** | **r** | **p-value** | **r** | **p-value** |
| Anxiety level | | | | | | |
| Psychological needs | -0.12 | 0.07 | | | | |
| Psychological stress | 0.2 | 0.002* | -0.1 | 0.15 | | |
| Depression | 0.25 | 0.0001* | -0.16 | 0.02* | 0.28 | 0.0001* |
| Psychological services | -0.02 | 0.69 | 0.003 | 0.96 | -0.01 | 0.88 |
| Self -esteem | -0.09 | 0.17 | 0.19 | 0.005* | -0.08 | 0.22 |

Significant level at p≤ 0.05

**Table (14-b): correlation between psychological variables (anxiety ,depression, psychological needs ,psychological pressure, psychological services and self -esteem scores)**

| **Variables** | **Depression** | | **Psychological services** | | **Self -esteem** | |
|---|---|---|---|---|---|---|
| | **r** | **p-value** | **r** | **p-value** | **r** | **p-value** |
| Anxiety scale | | | | | | |
| Psychological needs | | | | | | |
| Psychological stress | | | | | | |
| Depression | | | | | | |
| Psychological services | -0.03 | 0.6 | | | | |
| Self -esteem | 0.05 | 0.4 | -0.01 | 0.7 | | |

Significant level at p≤ 0.05

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## 2. DISCUSSION

The current study was conducted to assess mental health problems and services among deaf and mute adolescents by recruiting 200 deaf and mute adolescents from El Amal deaf and mute school in Lebanon square .Regarding reasons of deafness The study finding indicated that the two third of the participants reasons of their deafness due to hereditary and one third of them were due to accident and illness. these findings might be due to lack of awareness of existential of genetic centers in Egypt for treatment genetic disease especially hearing loss. Consequently, this might be having an effect on increase of the spread of genetics disease (especially hearing loss) among the family who has not access to such services. These results were supported by Mohanraj & Selvaraj, (2013) who indicated that the two third of reasons of deafness was hereditary (70 %) and one third of them was accident and illness(ear infections that viral, bacterial or parasitic infections) (30%) [22]. Moreover, Wafi (2006) indicated that, reasons of deafness among the majority of the studied sample was hereditary [23]. This finding was in contrast with El Nagar, El-Hebshy, (2011) who indicated that major reasons of deafness was acquired (prenatal infections from "TORCH" organisms (i.e., toxoplasmosis, rubella, cytomegalic virus, and herpes) or postnatal infection (54%) while 46% of the studied sample was hereditary [24].

Regarding history of family illness the findings of this study indicated that majority of studied sample (45.5%) have family history of deafness and mute with one person. majority of studied sample (70.5%) have family history of hearing loss. these results were supported by Mohanraj &Selvaraj, (2013) who indicated that majority of studied sample 64.7% had family history of deafness with either one or more persons .This finding might be due to lack of available services, lack of family counseling programs about this disease , lack of awareness of early diagnosis and detection programs for newborns that have this disease and early intervention and prevention for them .In addition to cost of reaching for specialist which might make it difficult for their parents to proceed for management of their adolescent [22] . Abdel Rahman, etal. (2007) who indicated that majority of studied sample (77.6%) have family history of hearing loss [25] , this finding was in contrast with, Mckee, and Vale, (2014) who indicated that majority of studied sample (80%) does not have any deaf or hearing impaired among relatives[26] .Hintermair ,(2008) who indicated that majority of deaf people had hearing parents (80%) ,20% of deaf people had deaf parents [27].

The present study indicated that, 50% of studied sample were male and 50% of studied sample were female. this result might be due to numbers of the students (males and females ) in all classes in this school are almost equal .This result were supported by, Botelho, etal. (2010) who indicated that half of studied sample were male and other half of studied sample were female [28] . This finding is in contrast with this result were supported by Abdel Rahman .etal (2007) who indicated that majority of deaf and mute adolescents were female [25] . Natel, Wfaie &Alhelw, 2007 [29] and Sreedhar &Reddy,2014 [30] who indicated that majority of deaf and mute adolescent 60% were male and 40% were female.

The current study results illustrated that, half of studied sample 50% were aged between 13-16 years old and other half of studied sample 50% were aged between 17-20 years old. This result were supported by El Nagar (2014) who claimed that 49% of studied sample aged between 12-16 years old and 51 % of studied sample aged between 17-20 years old .The adolescent stage is transition from adolescenthood to adulthood and this period require special dealing from family with their adolescent due to this period considered to be stressful due to adolescents struggle to develop their own identity and independence. This period is more complicated for deaf and mute adolescents and it seems to be particularly vulnerable to the challenges of this transitional period due to impaired verbal communication with both family members and peers consequently deaf and mute adolescents might suffer from social, behavior, and psychological problems such as low self-esteem, anxiety, depression or social withdrawal [30].

As regard parent education, this study illustrated that Majority of parents of studied sample (42%) were illiterate .this result were supported by Lier (2013), Who indicated that nearly half of the parent of deaf and mute adolescents were not highly educated [32] . These findings might play great role in this study as it might be correlated with lack of parent's awareness of early detection ,diagnosis ,intervention and prevention programs of this disease .these findings were in contrast with Gurbuz .etal ,(2013), who indicated that majority fathers of hearing impaired adolescent had (60%) had secondary school and college and majority mothers of hearing impaired adolescent had (40%) had elementary school [33]. Kobosko, (2011), who indicated that majority of parents of deaf and mute adolescent (45%) were highly educated (university education) [34].

Regarding stress level Results of current study indicated that deaf and mute adolescent have higher level of stress. This result were supported by, Cohen ,2014 [35], & Sreedhar & Reddy (2014) [30], who indicated that majority of deaf and mute adolescents had higher level of stress and decreased coping strategies .there for this finding might be due to the several sources of stressors that the adolescent were confronted with cumulatively such as psychological tension, social isolation , family burden, unemployment, friendship stressors, feeling of being rejection, neglect ion and denial from community toward them, communication constraints as sign language is not known to the spoken population , and social stigma .

Regarding depression level results of current study indicate that deaf and mute adolescent suffer from severe level of depression. This results were supported by, Theunissen etal ,(2011) [36], Theunissena.etal (2014) [37] who indicated that deaf adolescent suffer from high level of depression .this finding might be due to multiple factors that make adolescent might be exposed to sad ,painful and frustrated experiences and situations during their adolescenthood period this lead to they suffer from depression in adolescence .theses situation are such as communication problems, social withdrawal, family stressor, parenteral rejection for adolescent disability ,societal discrimination, stigma related to their disability ,rejection and neglect ion from others toward them. This finding is in contrast with wafi 2006) who indicated that majority of deaf and mute adolescents did not suffer from depression (77%) [23]. Brown and Cornes,2015 indicated that majority of deaf and mute adolescents suffered from low level of depression [38] .

Regarding anxiety level Results of current study indicate that deaf and mute adolescent have very severe level of anxiety. This result was supported by, Sharmista (2016) who indicated that deaf adolescent had high level of anxiety. This finding might be due to these adolescent confronted with several challenges and stressors that special for this life stage such as communication difficulties, vague occupational future and unsatisfied psychological atmosphere within their family and the school .these adolescent feel with high level of anxiety due to inability to be understood by others, their family members and their spoken peer and these adolescent don't know how to communicate with their family and their peers and they don't know how to express themselves and their feelings [39] .This finding is in contrast with, El Nagar (2014) who indicated that deaf and mute adolescents had low level of anxiety [31]. Moreover, Brown and Cornes, (2015) indicated that deaf and mute adolescents had low level of anxiety [38].

Regarding self-esteem level the results of current study indicated that majority of studied sample (66.5%) had moderate level of self-esteem. This result were supported by Abd Rani1 &Marzuki(2016), who indicated that deaf and mute adolescents have mild degree of self-esteem .the results of current study might be due to within the school satisfied provided care and services which provided for them throughout their teachers and specialist .whether psychological, social, educational services this lead to satisfy their needs increase psychological and social integration among deaf and mute adolescents thus teacher of the hearing disabled adolescent had important role in helping these adolescent to how deal with their problems , and how manage their social life [40] . In addition to the modern educational trends that mean increase attention for hearing disabled adolescent by qualify them in all aspects that lead to development of self-esteem for deaf and mute adolescent. This finding is in contrast with, Theunissen etal (2014) who indicated that deaf adolescent have lower levels of self-esteem [37]. This finding is in contrast with, ALharbi, (2003) [41], Jambor & Elliott )2005) [42] and Czyz etal (2015) [43] who indicate that deaf adolescent have high level of self-esteem and Soliman& kamal ,2010 indicated that all studied sample (100%) had high self-esteem [44].

Regarding psychological needs Results of current study indicate that majority of studied sample (88.5%) have high level of satisfaction of psychological needs .this finding may be due to increase attention from all around them to satisfy their needs and satisfaction of their psychological needs help them into decrease their psychological stressors, help them into how cope and overcome with their psychological stressors, and decrease mental health problems to feel high self-esteem. This finding is in contrast with Al Gohary (2006) who indicated that deaf adolescent have lower levels of satisfaction of psychological needs (52%) [19].

Regarding psychological services Results of current study indicate that all studied sample (100%) receive mild psychological services. these finding might be due to increase number of deaf and mute persons in Egypt that lead to the community begin to increase awareness and interest with deaf and mute persons by increasing centers and institutions that provide psychological services for these persons .this finding were supported by, Alashkar, (2002) who indicated that majority of studied sample (65%) receive psychological services [45].

Results of this study indicated that there was no significant relation between gender of deaf and mute adolescents, depression anxiety, self -esteem ,and psychological stress ,services and needs. This finding supported by Ghorab ,2008) who indicated that there is no statistically significant relation between anxiety level and sex of the hearing impaired students [46]. Also the study results in the same line with, Theunissen, (2011) who indicated that there is no significant relation between gender of deaf and mute adolescents and depression [36] . Wfaei, 2007 revealed that there was not significant relation between gender of deaf and mute adolescents and self -esteem [23] .These findings were in contrast with, Alashkar ,(2002) who indicated that there was significant relation between gender of deaf , mute adolescents and psychological services that provided for them [45] .Finding of this study was in contrast with, El Nagar, (2014) who indicated that there was significant relation between gender of deaf and mute adolescents, anxiety and depression that deaf and mute female were significantly more depressed and anxious than deaf and mute male [31] .Al Gohary ,2006 [19] & Agabry2010 who indicated that there was significant relation between gender of deaf and mute adolescents and psychological needs. Agohary ,(2006) indicated that, there was significant relation between gender of deaf and mute adolescents and psychological stress [19]. Kamel 2003 who indicated that there was significant relation between sex, anxiety and self- esteem [21] .

The current finding of this study revealed that there were positive significant relation between age of deaf and mute adolescents, psychological stressors and self -esteem. Theses finding were supported by, Mehrez ,(2009) who indicated that there was significant relation between age of deaf and mute adolescents and self -esteem [47].Theses finding might be due to when deaf adolescents have increasing his age, they have greater responsibility which make them face many psychological and social stressors such as barriers in seeking about employment, such as( communication barriers ,discrimination between hearing and deaf employee in work and access to interpreters, rejection and denial from community toward them and stigma related to their disability .due to all of these stressors and plenty of exposure them to it they feel low self esteem. Findings were in contrast with, Warner-Czyz etal , (2015) who indicated that there is no significant relation between age of hearing loss adolescents and self esteem [48]. Ghorab ,(2008) [46] and kandil ,(2007) [49] who indicated that there is no significant relation between age of hearing loss adolescents and anxiety.

The current findings reveal that there is positive significant correlation between depression and anxiety. These findings were supported with Kvam & Loeb , (2006) [50] and Kandil, (2007) [49] who indicated that there was positive significant relation between depression and anxiety of deaf and mute adolescents. These findings might be due to deaf and mute adolescents have a variety of stresses and problems that lead to them feel of anxiety such as communication problems, fear of health, financial and occupational future, fear of marital life such as choosing appropriate partners for life or not marriage ,family formation and inheritance disability, due to his disability to face and decrease these stresses lead to their feelings of depression. These findings were in contrast with, El- Nagar &ELhebshe, (2011) who indicated that there is no significant relation between depression and anxiety of deaf and mute adolescents [24] .

The current findings of this study revealed that there was no significant relation between parent's education of deaf and mute adolescents and psychological variables of deaf and mute adolescents ( anxiety ,depression self-esteem ,psychological stress, services and needs). These findings were supported by Al Ashkar, (2002) who indicated that there is no significant relation between parent's education of deaf and mute adolescents, anxiety and self-esteem [45]. These findings were in contrast with Al Harbi ,(2003) who indicated that there was a significant relation between father's education of deaf and mute adolescents and self –esteem of deaf and mute adolescents[41].

The current findings of this study revealed that there was a positive significant relation between self-esteem and satisfaction of psychological needs among deaf and mute adolescents. These findings were supported by, Lu., etal , (2015) [51] and Abd Rani & Marzuki, (2016) [40] who indicated that there was positive significant relation between self-esteem and satisfaction of psychological needs among deaf and mute adolescents . these findings might be due to psychological needs is significant for all persons especially deaf and mute persons .when individual satisfy his psychological needs ,he has motivations to satisfy a variety of needs related to his compatibility and adaptation with himself and with others such as his need to be safe, within the society and his need to feel of belonging and mutual love with individuals with in the society, this lead to he feel of sense of acceptance from the society so that he has high self-esteem by appreciation another for him, when psychological needs are not satisfying this lead to individual feel of frustration ,anxiety ,stress, irritability and he feels that the environment represents a serious threat to himself .it lead to delay or prevent his psychological growth so that he feel of low self -esteem.

The current findings of this study revealed that there was positive significant relation between anxiety and psychological stress among deaf and mute adolescents. These finding due to deaf and mute adolescents exposed to a lot of stressors such as language barriers, social rejection, denial and discrimination, stigma related to their disability, isolation, occupational difficulties. Plenty of exposure for these stressors leads to feel of anxiety. These findings were supported by El Nagar & El Hebeshe ,(2015) [24] and Gorab ,(2008) [46] who indicated that there was positive significant relation between anxiety and psychological stress among deaf and mute adolescents.

The current findings of this study revealed that there was positive significant relation between depression and psychological stress among deaf and mute adolescents. These finding due to increase accumulation of stressors that deaf adolescent face it and his inability to overcome and adapt with it .this make them feeling of inferiority ,frustration ,disability and loss sense of security. Result of these deaf adolescents feel depression. These findings were supported by Al Gohary,(2006) who indicated that there was positive significant relation between depression and psychological stress among deaf and mute adolescents[19].

The current findings of this study revealed that there was negative significant relation between depression and satisfaction of psychological needs of deaf and mute adolescents. These finding due to deaf adolescents have communication and language difficulties which lead to make them socially isolated and less satisfied with their psychological needs and they unable to satisfy it. individual “s failure to satisfy his psychological needs expose him into many psychological stress that Threat his mental health and affect his psychological balance this make him feel of depression. These findings were supported by, Mohanraj & Selvaraj ,(2013) who indicated that there was negative significant relation between depression and satisfaction of psychological needs of deaf and mute adolescents [22].

## 3. CONCLUSION

The current study clearly concluded that majority of studied sample had high level of anxiety, depression and psychological stress. Moreover majority of studied sample had moderate level of self- esteem , high level of satisfaction of psychological needs and moderate level of psychological services which provided for them . there were positive significant relation between anxiety and psychological stress , there was positive significant relation between depression and anxiety , there was positive significant relation between depression and psychological stress , there were self-esteem and satisfaction of psychological needs and there were negative relation between depression and satisfaction of psychological needs.it is extreme importance that provide special psychological department for this population and provide interpreter of sign language in all psychiatric clinics to understand their complains and their psychological problems, to apply and use the best therapeutic methods appropriate for their psychological problems moreover decrease their psychological problems .

## 4. RECOMMENDATIONS

Based on the study findings, the following recommendations were formulated:

- Provide psychological, social, vocational and educational services for deaf adolescent to reduce the negative characteristics of deaf adolescent
- Activate the role of counselors and psychologists in centers and outside centers dealing with deaf adolescent
- Improving community treatment for the hearing deaf and mute adolescent impaired and Providing opportunities for community integration for the hearing impaired
- Discover and develop the abilities of the hearing impaired adolescent and assisting them to accept their disability

## REFERENCES

[1] Drench, E., Meredith , K., Noonan, C., and Nancy, S. (2012) Psychological aspects of health care ;pearson education ,3rd ed .,pp.198-200.

[2] Kabaga, M. (2011). Psychological adjustment and its relationship with the character's qualities among deaf adolescent in Gaza strip governorates. master thesis Islamic University of Gaza, Deanship of Graduate Studies, Faculty of Education, Department of Psychology.

[3] Abdat, R. (2010). Harmonic behavior when Deaf and Hard Hearing as seen by their parents in The United Arab Emirates

[4] Naik, S, Naik, M& Sharma, K. (2013) Rehabilitation of hearing impaired adolescent in India Journal of Otolaryngology. 3 (1).34-39.

[5] WHO .(2016). Childhood hearing loss Strategies for prevention and care.

[6] Turan, Z. (2012). Early Intervention with Adolescent Who Have a Hearing Loss: Role of the Professional and Parent Participation.

[7] Kral, A., & O'donoghue, G. M. (2010). Profound deafness in childhood. New England Journal of Medicine, 363(15), 1438- 1450.

[8] World Health Statistics (2017). Monitoring health for the SDGs

[9] Azab.S, Kamel.A &Abdelrhman.S. (2015).. Otorhinolaryngology Department Faculty of Medicine, Beni-Suif University, Egypt, Correlation between Anxiety Related Emotional Disorders and Language Development in Hearing-Impaired Egyptian Arabic Speaking Children.

[10] Hamid O, Shoukry T and Shehata W. (2010) Prevalence and Pattern of Hearing Loss in Adolescent in House-held National Survey in Egypt. Egyptian Journal of Ear, Nose, Throat and Allied Sciences; 11: 12-16.

[11] Al-Zziadi.M. (2012). Unpublished Thesis , Institute Of Educational Studies ,Department Of Foundations Of Education, , Cairo University, The Reality Of Pre-University Education For The Deaf In Egypt In The Light Of Global

[12] Herman.R & Morgan.G. (2012). Deafness, language & communication. In: Botting, N. and Hilari, K. (Eds.), The Impact of Communication Disability Across the Lifespan. (pp. 101-121). Guildford: J & R Press.

[13] Lier ,FB. (2013). Mental health in deaf and hearing impaired adolescent and adolescents

[14] Fellinger.j, Holzinger.d &Pollard, R. (2012).. Mental health of deaf people.the lancet journal . 379.p:1037-1044.

[15] Edwards.E, VaughnJ, and Rotabi.K, (2007).Adolescent Abuse Investigation And Treatment For Deaf And Hard Of Hearing Adolescent .Ethical Practice And Polict .The Social Policy Journal.4(3/4).53-67.

[16] Alkasas.M. (2004). Social empowerment for people with special needs

[17] Burns, N. & Grove, S. K. (2011). Understanding Nursing Research: building and evidence-based practice 5th ed Elsevier St Louis

[18] Taylor, J.A., (1953), A Personality Scale Of Manifest Anxiety. Abnormal social psychology, 48, 285–290.

[19] Al Gohary ,A.(2006). Unpublished Thesis, Faculty Of Education, Mental Health Department, Zagazig University,Stress Scale And Psychological Needs Scale Of Adolescent Deaf And Mute.

[20] Beck, A.T., Ward, C. H., Mendelson, M., Mock, J., & Erbaugh, J. (1961) An inventory for measuring depression. Archives of General Psychiatry, 4, 561-571.

[21] Kamel.W, (2003).Faculty of Specific Education Benha, Zagazig University, Relationship of self-esteem and social concern in hearing impaired children.

[22] Mohanraj ,B.,& Selvaraj,I. (2013) Psychological issues among hearing Impaired adolescents. Journal of Education Science and Psychology, 2(24), 16-27.

[23] Wafi,L. (2006). Behavioral disorders and their relationship to the level of psychological adjustment the deaf and blind children. Unpublished Master Thesis, Islamic University,Faculty Of Education, psychology Department

[24] El- Nagar.T &ELhebshe.M, (2011). The Anxiety stat and Depression its Relation to Psychological Adjustment for Hard of Hearing Students.

[25] Abdel Rahman,A. ,Micky ,F.,Allam,M., Tabakh, M., & Gaafary, M.(2007). Prevalence and risk factors for hearing disorders for secondary school students in Esmailia and Egypt. Journal of Eastern Mediterranean Health 13(3), 586-594.

[26] Mckee ,R.,& Vale,M.(2014). Parents of Deaf And Hearing Impaired Children: Survey Report. Retrieved from https://www.victoria.ac.nz/lals/centres-and-institutes/dsru/NZS.

[27] Hintermair, M .(2008). Self-esteem and satisfaction with life of deaf and hard-of-Hearing people-a resource-oriented approach to identity work. Spring,13(2),278-300.

[28] Botelho ,F. , Bouzada ,M. , Resende,L. , Silva ,C., & Oliveira,E .(2010).Prevalence of hearing impairment in adolescent at risk. Brazilian Journal Of Otorhinolaryngology, 76,739-766.

[29] Natel ,R. , Wfaei,M.,&Alhelw,A .(2007).The Distinguishing features of the Persons with disabilities are audiovisual, visual and dynamic in light of some variables. Islamic University Gaza Palestine.

[30] Sreedhar,T.,&Reddy,V.(2014) . A Cross-sectional study on perceived stress and coping mechanism among adolescent suffering with mute and hearing impairment. International Journal of Science and Research,5(1),1686-1689.

[31] El Nagar, T. (2014). Future anxiety of hearing impaired students its relationship with some variables.

[32] Lier, F.B.(2013). Mental health in deaf and hearing impaired adolescent and Adolescents. Retrieved from https://www.duo.uio.no/bitstream/.../Prosjektoppgave-FrideLier.

[33] Gurbuz,M., Kaya,E., Incesulu,A., Gulec,G., Cakli,H.,Ozudogru,E.,&Colak,E.(2013). Parental anxiety and influential factors in the family with hearing impaired children: before and after cochlear implantation. The Journal of International Advanced Otology, 9 (1), P:46-54.

[34] Kobosko,J. (2011). Parenting a deaf child- how hearing parents cope with the stress of having deaf children. Journal of Hearing Science, 1, 38-42.

[35] Cohen ,M .(2014 ).Adolescents with Hearing Impairment: Coping with Environmental Stressors. An International Journal OF Review Of Disability Studies: 13( 2),1-15.

[36] Theunissen ,S.C., Rieffe,C , Kouwenberg,M, Soede,W, Briaire,J.J.,&Frijns,J.H.(2011). Depression in hearing-impaired children. International Journal of Pediatric Otorhinolaryngology, 75(10):1313-1317.

[37] Theunissen,S.C., Rieffe,C., Netten,A.P., BriaireJ.J., Soede,W.,Kouwenberg,M., & Frijns,J.H.( 2014). Self-Esteem in Hearing-Impaired Children: The Influence of Communication, Education, and Audiological Characteristics. Journal of PLOS one ,9(4),1-9.

[38] Brown,M., & Cornes,A .(2015). Mental health of deaf and hard-of-hearing Adolescents. Journal of Deaf Studies and Deaf Education. 20, 75-81.

[39] Sharmista,A.(2016). Cognitive Development in Deaf Children. International Journal of Education and Psychological Research, 2( 2), 92-94.

[40] Abd Rani,U &Marzuki,N. (2016). Emotional intelligence, psychological well- being and self-esteem among hearing-impaired students. International Journal of Humanities and Social Science Invention,5(11) 1-5.

[41] Al Harbi,K.(2003).The relationship between self -concept and aggressive behave in deaf students. Unpublished Master Thesis, Naïf Arab Academy for security sciences, Faculty of graduate studies, sociology Department. Retrieved from www.gulfkids.com/pdf/Sum.pdf.

[42] Jambor ,E.,&Elliott,M.(2005).Self -esteem and coping strategies among Deaf students, University of Nevada, Reno, Journal of Deaf Studies and Deaf Education, 10 ,63-81 .

[43] Czyz ,A., Loy,B.,Evans ,C., Wetsel,A., & Tobey ,E.( 2015) .Self-Esteem in Adolescent and Adolescents With Hearing Loss, Journal Of Trends In Hearing ,19,1-20.

[44] Soliman,A., &kamal ,B. (2010). Centre for deaf adolescent between the exercise activities fitness and sports and self-esteem. Unpublished Master Thesis , Algeria University, Physical Education And Sports Institute, Physical Sports Activity Adjuster Department. Retrieved

[45] Alashkar,A .(2002). Services provided to deaf adolescent and its relation with their personal characteristics in Gaza .Unpublished Master Thesis , Gaza University ,Faculty Of Islamic Education ,Mental Health Department. Retrieved from http://library.iugaza.edu.ps/thesis/52936. .

[46] Ghorab ,H.(2008) . The psychological problems of the handicapped adolescent in Gaza comprehensive schools from teachers' perspective. Journal of the Islamic University (Series of Humanities Studies) ,5, 533 - 560.

[47] Mehrez.M. (2009). Parenting trends in upbringing as perceived by deaf students intermediate and secondary Phase Holy Capital and its relationship to the concept of self. unpublished Master thesis, Umm Al Qura University, faculty of education, psychology department. Retrieved from https:// search. mandumah. com/Record/610820.

[48] Warner-Czyz,A., Loy,B.,Evans ,C., Wetsel,A., & Tobey ,E.( 2015) .Self-Esteem in Adolescent and Adolescents With Hearing Loss, Journal Of Trends In Hearing ,19,1-20.

[49] Kandil ,Sh .(2007) . Personality variables for the hearing impaired, tinnitus and dizziness patients. Unpublished Master Thesis, Mansoura University, Faculty of Education, Mental health department. Retrieved from http://www. arbi.ws/vb/showthread.php?t=5209.

[50] Kvam, M., Loeb, M.,& Tambs, K. (2007). Mental health in deaf adults:symptoms of anxiety and depression among hearing and deaf individuals. Journal of Deaf Studies & Deaf Education, 12(1), 1-7.

[51] Lu,A., Honga ,X., Yua,Y., Linga,H., Tiana,H., Yud,Z.,& Change,L.(2015).Perceived physical appearance and life satisfaction: A moderated mediation model of self-esteem and life experience of deaf and hearing adolescents. Journal of Elsevier , 39, 1–9.