



وحدة النشر العلمي



كلية البنات للآداب والعلوم والتربية



مجلة البحث العلمي في التربية

مجلة محكمة ربع سنوية

العدد 12 المجلد 22 2021

مجلة البحث العلمي في التربية (JSRE)

رئيس التحرير

أ.د/ أميرة أحمد يوسف سليمان
عميدة كلية البنات للآداب والعلوم والتربية
جامعة عين شمس

نائب رئيس التحرير

أ.د/ حنان محمد الشاعر
وكيلة كلية البنات للدراسات العليا والبحوث
جامعة عين شمس

مدير التحرير

أ.م.د/ أسماء فتحي توفيق
أستاذة علم النفس المساعد بقسم تربية الطفل
كلية البنات - جامعة عين شمس

المحرر الفني

أ.نور الهدي علي أحمد

سكرتير التحرير

نجوى إبراهيم عبد ربه عبد النبي

دورية علمية محكمة تصدر عن كلية البنات للآداب
والعلوم والتربية - جامعة عين شمس.

الاصدار: ربع سنوية.

اللغة: تنشر المجلة الأبحاث التربوية في المجالات
المختلفة باللغة العربية والإنجليزية

مجالات النشر: أصول التربية - المناهج وطرق
التدريس - علم النفس وصحة نفسية - تكنولوجيا التعليم
- تربية الطفل.

الترقيم الدولي الموحد للطباعة ٢٣٥٦-٨٣٤٨
الترقيم الدولي الموحد الإلكتروني ٢٣٥٦-٨٣٥٦

التواصل عبر الإيميل

jsre.journal@gmail.com

استقبال الأبحاث عبر الموقع الإلكتروني للمجلة
<https://jsre.journals.ekb.eg>

فهرسة المجلة وتصنيفها

١- الكشاف العربي للاستشهادات المرجعية

The Arabic Citation Index -ARCI

٢- Publons

٣- Index Copernicus International

Indexed in the ICI Journals Master List

٤- دار المنظومة - شمعة

تقييم المجلس الأعلى للجامعات

حصلت المجلة على (٧ درجات) أعلى درجة في تقييم
المجلس الأعلى للجامعات قطاع الدراسات التربوية.

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

Dr. Doaa Fathy Megawer*

Dr. Safaa Ahmed Agaga**

Abstract:

Nomophobia is discomfort, loss of rest and appearance of anxiety due to the unavailability of the smart phone that the student used to have with him all the time, and the fear to lose contact with the net or the information, and the fear to lose communication with others through the smart phone. The Current research aims at investigating the relationship among nomophobia, depression and alexithymia refer to non-clinical patients, and it is represented in the presence of difficulties in describing, identifying feelings, and orientation towards outward thinking. the descriptive approach is used. The sample of the research included (310) male and female students ranging from (15 to 18) years old. This sample was derived from three secondary schools in Tanta city. The researcher has applied Nomophobia questionnaire (Yildirim & Correia, 2015) as well as Toronto Alexithymia scale (TAS-20). After being edited to Arabic language In addition, Beck depression inventory (BDI) has been delivered after being translated by (Ghareeb, 1999). The results showed that there are positive correlation coefficients and a statistical significance among nomophobia, alexithymia and depression. The results of multiple stepwise regression analysis indicated that Nomophobia can be predicted through the total degrees of alexithymia and depression. The results were discussed and the researcher have formulated some recommendations and suggestions.

Keywords: Nomophobia, Alexithymia, Depression, Smartphone and Adolescence.

*Faculty of Education, Mental Health Department, Tanta University, Egypt.

Email: Doaa.megawer@edu.tanta.edu.eg

**Faculty of Education, Mental Health Department, Zagazig University, Egypt.

Email : dr.safaa_agaga@yahoo.com

Received on:25 /12/2021 -Accepted for publication on:11/1/2022- E-published on:12/2021

Introduction:

During the increase of using internet especially through smart phones, there is a new kind of phobia called nomophobia which is an abbreviation for four words: no, mobile, phone, phobia. It means the inability of using the smart phone because it is inaccessible. Nomophobia results in feelings of anxiety and worry. This happens especially for individuals who are not able to use their mobile phones or benefit from the advantages or applications of their phones. **(King, Valenca, & Silva, et al., 2014; Yildirim & Correia, 2015).**

Those who suffer from nomophobia especially t adolescents suffer from alexithymia which means that there is a weak ability of expressing feelings and emotions towards others as well as a number of thinking disorders **(Yavuz, Altan, & Bayrak, et al ., 2019)**. Nomophobia is strongly related to psychological problems including anxiety, depression and worry. Also, it is negatively related to the quality of life **(Sharma, et al., 2019; Alteiby, 2020)**. The adolescents and youth's excessive use of the smart phones led to a lot of problems including depression, low school achievement and decrease of self-esteem **(GiSeo, et al., 2016; Mohammed, 2019 & Algasser, 2018)**. According to Central Agency for Public Mobilization and statistics (CAPMAS) 2013/2014, users of Internet in December mounted (38) million and (800000). (70%) of those persons use internet through their smart phones which is a high ratio. **(Egyptian Central Agency for Mobilization and Statistics, 2014)**

The sense and concern for the problem of research was inspired by the fact that the researchers observed their teenage had been isolated from the family and had been so busy with their smartphones that they hardly left it out of their hands at all.

Through preparing the study, the researcher depended greatly on the analytical results of **(Rodriguez – Garcia, et al., 2020)** studies (42) which were published in Scopus and the Web of Science. Those studies focused on the negative results nomophobia causes including: low self-esteem, depression, anxiety, stress, low academic performance, mental and psychological problems besides behavioral and psychological problems for young people and adolescents.

Researchers have found- as far as they know- that there is a research gap in the previous studies, as the researcher could not find any Egyptian study interested in studying the relation between Nomophobia, Alexithymia, and depression at the

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

secondary school stage and also the study of the possibility of predicting Nomophobia through Alexithymia and depression.

The associations between Nomophobia and mental health problems (e.g., anxiety and depression) may be especially strong among adolescents. Specifically, adolescents experience faster Physiological growth but slower Psychological development in the transition Period, which leads to relatively low levels of Psychological maturity. In addition, adolescents are exposed to compounded stressors such as substantial stress from their academic and daily lives (**Bluth& Blanton, 2014; Frison & Eggermont, 2015**).

The basic hypothesis of this research is summed up in two points: First point: is that the secondary school students suffering from Nomophobia or the disease of attachment to the cell phone already suffer Alexithymia, and have difficulties in describing, identifying feelings, and orientation towards outward thinking, so they resort to expressing their feelings and thoughts from distance- using cell phones. And this hypothesis was dealt with by some previous studies including: (**Berardis, et al., 2008; Scimeca, et al., 2017; Mei, et al., 2018**)

As concerning the second point of the main hypothesis: is that the secondary school students who suffer from Nomophobia, also already suffer depression and loneliness, therefore they are more attached to their cell phone and they fear losing them or losing the contact with information at any time, these studies include: (**Sharma, et al., 2019; Al-Otaibi, 2020**)

Thus the current research is for trying to understand Nomophobia disorder at the secondary school students and to answer a main question: whether Nomophobia happens as a result to Alexithymia and depression, or is it possible to predict Nomophobia through them. Though this research, the researcher will seek to present a comprehensive theoretical framework for the three variables and explain their relationship to each other through following the predictive descriptive method.

Theoretical Frame& literature:

Nomophobia:

Nomophobia is a new term which means that people are afraid of not having a smart phone especially adolescents who suffer greatly when they lose

their mobile, when the battery is empty, when they don't have credit, or when the signal is bad. Nomophobia results in a lot of health problems (**Abraham, Mathias & Williams, 2014**)

Nomophobia is described by upset, worry and over anxiety resulting from not being connected to smart phones (**Sharma, et al., 2019, 231**). Nomophobia is also a new phobia which means the fear of not having a mobile phone (**Kaviani, et al., 2020**). Nomophobia refers to a group of symptoms and behaviors related to the use of the smart phones. It is also an external phobia related to open places phobia. It includes the fear of the feeling of not having urgent help (**King, et al., 2014, 28**).

Symptoms of the Nomophobia:

People who have nomophobia suffer from worry and anxiety for many reasons: the unavailability of the mobile phone, impossibility of using it, the signal is bad, the battery is low, they don't have enough credit to make calls or they have more than one cell phone. Those people usually carry the charger with them all the time. They always use the mobile phone day and night. They avoid being in the places which ban using mobile phones such as theatres and airports. They always put their mobile phones near them on the bed. In addition, those people are not sociable; the thing which leads to anxiety and worry. The expenses of those people who suffer from nomophobia are too much (**Bragazzi & Del Puente, 2014; Yildirim & Correia, 2015; Rodriguez – Garcia, et al., 2020**). There are other phenomena related to nomophobia other than the above-mentioned ones including : increase of heart beats, changes in the respiratory system, shivery, over sweat, excitement as well as fear and depression (**King, et al., 2014; Bhattacharya, et al., 2019**)

Relationship between Nomophobia and Alexithymia:

Sifneos (1973) put a set of characteristics to make it easy For specialists to diagnose physical and psychological patients including :difficulties in defining feelings, difficulties in differentiating between emotions and the physical feelings and the inability of communicating with others besides low imagination; the thing which decreases the interaction with the external environment (**Nowakowski, et al., 2013**). Alexithymia also means the low ability of defining and distinguishing emotional aspects of social interaction (**Franz, el al., 2008, 54-55**). It is clearly noted, however; that individuals who suffer from alexithymia had difficulties in

building correct personal relationships; they were more depressed. Also, they suffer from a lot of demographic changes such as age, gender, economic and social status. **(Timoney & Holder, 2013)**.

The structure of Alexithymia draws attention on deficiencies in the cognitive processing of emotions, which remain undifferentiated and have poor organization **(Taylor, Bagby, & Parker, 1991)** People who overuse cell phones, most probably have difficulties in expressing their emotions more than others **(Ha, et al., 2008)**. The individuals who suffer from Alexithymia may resort to communication, managing their own mood, and organizing their emotions, during social interaction through finding a more effective means of communication that suit them. **(McKenna, & Bargh, 2000)**

Thus, there is an important question: whether alexithymia and depression were interdisciplinary or separated structures. By using Beck Depression inventory (BDI) and Toronto alexithymia scale (TAS), there is big evidence referring that depression and Alexithymia are distinguished, psychological structures but related together **(Parker et al, 1991; Hintikka, et al., 2001)**. To evaluate the relationship between alexithymia and depression, an experiment was done over (116) patients suffering from depression besides (540) of healthy persons. Finally, it's concluded that depression severity is greatly related to alexithymia **(Honkalampi, Hintikka, & Laukkanen, 2001)**.

Individuals who suffer from alexithymia symptoms and face difficulties in expressing their emotions and exchanging them with others may use internet excessively to satisfy their social needs **(Scimeca, et al., 2017)**.

Several studies indicated that there is a relationship between Alexithymia and different types of addiction, including Opioid use disorder **(Haviland, et al., 1994)** And alcohol use disorder **(Barth, 2016)**. And Behavioral addiction is like internet addiction **(Schimmenti, 2017)**. Having alexithymia, there is a positive tendency for smart phone addiction directly or indirectly via using it for fun and in dealings **(Hao, et al., 2019)**. High levels of alexithymia led to the extreme adherence to smart phone for a adolescents. Also, reducing Alexithymia leads to reducing pathological attachment to the smartphone. **(Mei, Xu, & Gao, 2018)**. Furthermore, alexithymia is considered a dangerous Factor leading to addicting smart phone **(Berardis, et al., 2008)**. Some users of smart phones see that SMS

doesn't help them only to build deeper friendships, but they also make them far from face-to-face interactions (**Kamibeppu & Sugiura, 2005**).

Relationship between Nomophobia and Depression:

The term depression is used to describe self-emotional experience whether it was mental or reactive state or it may be social or physical disorder. Depression refers also to Cognitive, behavioral and physiological symptoms (**Ibrahim & Asker, 2009, 71**). Depression and alexithymia are often described as similar structures; the thing which led some authors to suggest that the subscales of alexithymia look like the subscales of depression (**Cohen, 1989**).

Some modern experimental researchers boosted the idea referring that individuals suffering from nomophobia suffer from stress when they don't have their mobile phones (**Samaha&Hawi, 2016**).

The recent study was applied on a sample of (2159) male and female students at preparatory and secondary schools in South Korea. The results showed that dependence on Smart phones may cause depression; the thing which affects badly the social relationships between friends, teachers, those who learned Korean language and those who learned mathematics (**Giseo,et al., 2016**)

That study focused greatly on reviewing and realizing clinical symptoms and different precautionary measures taken against nomophobia. It can be concluded that addicting smart phones and social networking sites may lead to depression, worry and losing memory (**Aarthi, et al., 2020**). It must be stated, however; that using a smart phone after getting up immediately for a 5-minute period and For 61 minutes before sleeping is it strongly related to depression symptoms among Chinese adults in Hong Kong (**Lee, et al., 2020**). About (569) adolescents among (1386) ones with a ratio (41.05%) suffer from nomophobia. It is also noted that there is a positive statistical significance between degrees of nomophobia, depression and other disorders (**Sharma, et al., 2019**).

Research Problem:

There are many questions related to the problem of the Research:

- What is the relationship between dimensions of nomophobia, alexithymia and depression for secondary school students?

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

- Is it possible to predict nomophobia degrees through depression and alexithymia degrees for secondary school students?

Methodology:

The researcher used descriptive method in the study . The sample of the Research included (310) male and female students of the secondary school students from three Secondary Schools in Tanta. Sample selection was made intentionally among the students who own more than one smartphone for at least more than three years. (130 were male students and 180 were female students). Male students represent (42%) of the research sample, while the female students represent (58%) of the sample. Their ages range from (15 to 18) year with arithmetic means (16.80) and standard deviation (1.43).

Research tools:

The Current research has depended on a nomophobia scale in Arabic prepared by (**Yildirim & Correia, 2015**). The scale included (4) basic dimensions which were applied on a sample of students at universities in Turkey: **First dimension**: not being able to communicate: This dimension means that the individual feels the loss of the instant contact with the people, the inability to use the services that allow instant contact, and the phrases stated in this subject are related to the feeling of the individual of losing his ability to contact the others and vice versa. **Second dimension**: losing connectedness: This dimension means that the individual feels loss of contact through the phone everywhere and also the feeling resulting from detachment from personal identity or alias in the internet. **Third dimension**: not being able to access information. It means annoyance of the loss the ability of permanent access to the information through the phones, and the inability to retrieving and searching them. **Fourth dimension**: giving up convenience: This dimension is related to the feelings of giving up comfort provided by the phone, and reflects the wish related to benefiting from the comfort it provides.

Nomophobia scale consists of (20) phrases, and scores are graded according to five-point Likert scale, ranging between: strongly agree and strongly disagree, and the score (100) is the maximum degree of this scale.

As for alexithymia Toronto scale (**Bagby et al., 1994**) Prepared by the researcher in Arabic, it is about a strong self- report for evaluating the severity of

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

being injured by alexithymia. It includes (20) statements divided into 3 Dimensions: difficulty and describing feelings (5 elements), difficulty of expressing feelings (7 elements) and adopting the external thinking (8 items). Responding to these dimensions can be evaluated according to Likert Scale which ranges from 1 strongly agree to not strongly agree. Psychometric attributes are reported (TAS-20) with a good internal consistency ranging from (0,77 to 0,88) in clinical and non clinical groups respectively . The break point is score (60) and the persons who obtained it or more are considered suffering from Alexithymia, and the score (100) represents the maximum for this scale.

Beck, the American Psychiatrist, is considered the original author of The Depression inventory (BDI) translated by (Ghareeb, 1999). The scale became available for general use in Egypt in (1985). Since then, it became widely used in Egypt and Arab countries whether it was a research tool or a clinical one. In the researchers' opinion, the scale can be used with 15– year-old individuals and above .The scale consists of (13) statements including: Sadness, optimism, feeling of failure, feeling of dissatisfaction, feeling of guilty, self-hatred, self-harm, unsociability, hesitation, change of self-image, difficulty of sleeping, losing appetite . The scores are graded on this scale according to Likert, ranging between: (0,1,2,3) and the score (39) represents the maximum limit for scores in this scale.

Data analysis:

The statistical analysis of data was done through the statistical package for social sciences (IBM SPSS Statistics for windows V. 22). The Researchers calculated the average, standard deviation for research sample, then Pearson correlation coefficient between the three variables (Nomophobia, Alexithymia, and depression) and analysis of Step Wise regression in order to determine the contribution score of both Alexithymia and depression in predicting Nomophobia.

Result's:

The Frist Question Result's:

The first assumption of the research states that there is a positive relationship and a statistical significance between the dimensions of Nomophobia, Alexithymia and Depressions for secondary school students. To verify this assumption, values of correlation coefficients between the three variables are done

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

by using Pearson correlation coefficient. Tables 1_2_3 show the above-mentioned results:

Table (1) Correlation Coefficients for Nomophobia and Alexithymia with their Dimensions for secondary students (N=310)

Nomophobia	Difficulty in defining feelings	Alexithymia Difficulty in expressing feelings	Outward orientation of thinking	Total degree of Alexithymia
Not Being able to communicate	.162**	.377**	.261**	.590**
Losing connectedness	.134*	.015	.270**	.126*
Difficulty in accessing information	.169**	.354**	.178**	.473**
Giving up convenience	.245**	.197**	.191**	.487**
Total degree of nomophobia	.611**	.546**	.199**	.545**

* refers to the significance level (0,05), and ** refers to the significance level (0,01).

Table (1) Proves that there is a positive relation Between Nomophobia and alexithymia and its dimensions, A statistical significance. That means those who suffer from Nomophobia also suffer from alexithymia.

Table (2) Correlation Coefficients Between Nomophobia with its Dimensions and Depression for Secondary Students (N=310)

Nomophobia dimensions	Total degree of depression
Not Being able to communicate	.520**
Losing connectedness	.071
Difficulty in accessing information	.258**
Giving up convenience	.497**
Total degree of nomophobia	.581**

Table (2) Proves that there is a positive Relation and A statistical Significance at the Significance level (0.01) between Nomophobia and Depression. That Confirms that those who suffer from nomophobia also suffer from Depression Symptoms.

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

Table (3) Correlation Coefficients Between Depression and Alexithymia Dimensions for Secondary Students (N=310)

Dimensions of Alexithymia	Total degree of depression
Difficulty of defining feelings	.385**
Difficulty of expressing feelings	.463**
Outward orientation of thinking	.322**
Total degree of alexithymia	.715**

Table (3) Proves that there is A positive relation and A statistical Significance Between Depressions at level (0.01). Results of Tables (1), (2) and (3) make the first Assumption of the research true.

The Second Question Result's:

In order to check the possibility of predicting nomophobia through degrees of alexithymia and depression for secondary students, the step multiple regression analysis method was used namely " step wise"

Table (4) results of analyzing the difference between variables of alexithymia, depression and the dimension of difficulty of defining feelings

Model	Sum of Squares	df	Mean Square	F	Sig.
Regression	16237.7831	3	5412. 594	60.421	.000
Residual	27322.418	305	89. 582**		
Total	43560.201*	308			

Table (4) Refers that the Value of (F) is (60.421) at Significance level of (0.01). Consequently; it is Possible to from the Equation of linear Regression so that we can know the Proportional Contribution of Depression and Alexithymia variables as well as dimension of defining feelings at alexithymia scale in order to predict the probability of Nomophobia suffering.

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

Table (5) analyzing step-wise to predict nomophobia degrees (Dependent Variable) by looking at degrees of Alexithymia, Depression and the Dimension of defining feelings (the independent variables)

Model	R	R square	B	Beta	Std. Error	T Value	Significance level
Constant	-	-	36.338	-	4.613	8.152	.01
Alexithymia	0.545	0.297	0.587	0.545	.052	11.379	.01
Depression	0.581	0.545	0.829	0.288	.192 .184	4.329	.01
Difficulty of defining feelings	0.611	0.373	0.766	0.220		4.157	.01

Table (5) Shows that the Square of the Multiple Correlation Coefficient of Alexithymia Variable is (30%) out of the Dependent variable variation (nomophobia) which is related to the Independent variables of alexithymia. (34%) of the dependent variable variation (nomophobia) is related to the Independent variables of depression. Also, (37.3%) of the dependent variable variation (nomophobia) is related to the independent variables of the dimension of the feelings defining difficulty. And also Table (5) shows that the value of (B) is statistically significant at level (0,01) which confirms the power of step-wise models from the statistical aspect. That means that the total degree of alexithymia and depression contributes to predict nomophobia. The Dimension of the feeling defining difficulty is one of Alexithymia dimensions. Each increase in standard deviation by one in Alexithymia increases nomophobia by(0.545) standard deviation. Every one standard deviation increase in depression increases nomophobia by (0.288). Also, for each increase in the standard deviation by one in the dimension of difficulty in identifying feelings, the nomophobia increased by (0.220) standard deviation. It must be noted that the outward orientation of the thinking and the dimension of expressing feelings haven't contributed to predict nomophobia for secondary students. Consequently, it is easy to form the equation of Predicting Nomophobia as follows:
$$\text{Nomophobia} = 36.967 + 0,545 * \text{alexithymia} + .829 * \text{Depression} + .766 * \text{feeling defining difficulty}$$
 (Zaid, 2015). By that result, the Second Assumption of the research is valid.

Discussion:

The researcher deals with a modern variable (Nomophobia) which is related to the technological progress and the misuse of smart phones .There are studies which care with studying the relation between nomophobia and alexithymia besides the relation between nomophobia and depression. So the present research seeks to investigate the relation between the three variables and trying to predict the nomophobia through alexithymia and depression. It is also noted that nomophobia is strongly related to alexithymia dimensions. With reference to Table (1) the researcher find that Correlation coefficient value between Nomophobia, as a total score and Alexithymia is (.545) and this value is statistically significant at the level of (0.01). This shows that secondary students who suffer from nomophobia often suffer from alexithymia with its different dimensions (Mei, et al., 2018; Gao, Li, & Zhang, et al., 2018; Yauvz, et al., 2019; Al-Oteiby, 2020; Elkholy, Elhabiby& Ibrahim,2020). Results also show that there is a relation between nomophobia dimensions and depression; the thing which confirms that students who suffer from nomophobia is often injured by depression symptoms. With reference to table (2) the researcher find that Correlation coefficient value between Nomophobia, as a total score and depression is (0,581) and this value is statistically significant at the level of (.01) and this result consists with the results of the study (Gao, et al., 2018;Sharma, et al., 2019). The result of the current research consists with the result of the study of (Ozdemir & Cakir & Hussain, 2018). This confirms that the higher the nomophobia, the lower the psychological happiness of individuals and this is because the feeling of the individual of giving up his comfort and the inability to contact through the phone makes them enter in a state of worry and tension, and this no doubt makes him lose his happiness and satisfaction with life. he will be in a state of depression. The attachment to the cell phone reaches to the extent of depression in the event of not using it. (Pooja, et al., 2016;Yang, Zhou, Liu& Fan, 2019). In Jordan's secondary school, it's noted that nomophobia and psychological feeling is related with isolation. (Aldalalah, 2020) The previous results emphasize the strength of the relationship between nomophobia and depression. Results of the present research shows a relation between alexithymia and depression. With reference to table (3) the researcher find that Correlation coefficient value between them reached (0.715) and it is a high value and

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

statistically significant at the level of (.01). This confirms that students who suffer from alexithymia dimensions (difficulty of expressing feelings and outward orientation of thinking) also suffer from depression symptoms. And this result consists with the result of the study of (Li, Bin, & Zhang, et al., 2015; Gao, et al., 2018). In addition, alexithymia is considered a common personality model which has a great attention from specialists of psychological therapy (Grabe, et al., 2008) along with depression. It is an emotional attribute existed in the psychological disorders. (Edwards, Shivaji & Wupperman, 2018). Alexithymia is the weakness of the ability to understand emotions and to express them, as a personality trait of an emotional nature, and the high levels of it are considered is an obstacle for the normal coexistence with the exciting situations, and leads to weak individual social interaction, and is related with high averages of suffering from several physical and psychological diseases and among the most important psychological disorders related to Alexithymia is depression. Alexithymia predicts the injury with nomophobia (Gao, et al., 2018; Hao & Jin, 2020). The individuals who depend on cell phones suffer from deficiency in recognizing facial expressions, and they take a longer time to determine the kinds of feelings. Alexithymia is closely related to irregularity of emotions and effects, which makes it difficult to direct individual's behavior. (Quoted from; Mei, et al., 2018). One of the possible interpretations of this relationship is that the persons who suffer from Alexithymia tends to regulate their emotions through different types of behavior that causes them Nomophobia. The people who suffer from Alexithymia, may use the internet to express their feelings as nonverbal compensation strategy. (Nemiah, berger & Sifneos, 1976). Also, depression predicts injury with nomophobia. This result consists with the result of the study of (Samaha & Hawi, 2016). The possible interpretation of predicting nomophobia through depression may be that when adolescents look at themselves, others, and the world around us negatively, they seek to attach more to the cell phone more than the attachment to the others, to be the source of information, contact and communication for them and they give up their comfort for it , therefore they suffer from Nomophobia disorder, they fear losing their phone at any time.

Conclusion:

Finally, the research of the relationship between Nomophobia, Alexithymia and depression requires more studies are needed to deepen their understanding,

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

and it is better to care for modeling this relationship on larger samples of adolescents and youth. the researcher also recommend studying this relationship in light of some demographic variables like: (Gender, number of years of having the smart phone, calendar order, and number of family members). It is also possible to study those variables in their relation with parental treatment.

Recommendations:

The Current research has dealt with the danger of being injured by nomophobia which is strongly related to alexithymia and depression for secondary school students _the research sample. It is a necessity to guide families and warn them about the social, psychological and health problems of the extreme adherence to mobiles especially adolescents who suffer from nomophobia besides designing guidance programs to help them get rid of unrest and reduce depression and alexithymia. In addition to the necessity Increasing life activities and student clubs for the secondary school students in order to eliminate their use of cell phones for long times.

References

- Aarthi, K. Prathap, L. Priya, J. & Preetha, S.(2020). Nomophobia and its Impact on Health and Mind - A Structured Review .*European Journal of Molecular & Clinical Medicine*, (7), 1, 334-341. https://ejmcm.com/article_2204.html.
- Abraham, N., Mathias, J & Williams, S. (2014). A Study to Assess the Knowledge and Effect of Nomophobia Among Students of Selected Degree Colleges in Mysore .*Asian. Journal of Nursing Education and Research*; 4, (4) , 421-428. <https://www.proquest.com/>.
- Aldalalah, O. (2020). Fear of Losing the Mobile Phone Nomophobia among Students and Its Impact of Psycho-Loneliness and Learning in the Light of Some Variables. *International Association of Online Engineering*. Retrieved January 23, 2021 . <https://www.learntechlib.org/p/217806/>
- Algasser, L (2018). Disorder of fear of losing a mobile phone (nomophobia) and its relationship to academic achievement among secondary education students in the State of Kuwait. *Journal of Scientific Research in Education*. 19, 17, 591-611. doi. 10.21608/JSRE.2019.61468

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

- Al-Otaibi, M. (2020). *Nomophobia "Fear of losing a smartphone among a sample of adolescents in Jeddah* . 'Master's Thesis, College of Social Sciences, University of Jeddah, Saudi Arabia. <http://search.mandumah.com/Record/1093984>.
- Bagby, J.D.A. Parker, G.J. & Taylor. (1994). The twenty-item Toronto alexithymia scale—I. Item selection and cross-validation of the factor structure. *Journal of Psychosomatic Res*, 38 (1), 23-32. doi.org/10.1016/0022-3999(94)90005-1.
- Barth, F. D. (2016). Listening to words, hearing feelings: Links between eating disorders and alexithymia. *Clinical Social Work. Journal*, 44(1), 38–46. doi.org/10.1007/s10615-015-0541-6.
- Bhattacharya, S. Bashar, M. Srivastava , A. & Singh, A. (2019). Nomophobia: NO Mobile Phone Phobia . *J Family Med Prim Care*, (4), 8, 1297- 1300. DOI: 10.4103/jfmprc.jfmprc_71_19. DOI: 10.4103/jfmprc.jfmprc_71_19.
- Bluth, K., & Blanton, P. W. (2014). Mindfulness and self-compassion: exploring pathways to adolescent emotional well-being. *Journal of Child and Family Studies*, 23, 1298–1309. DOI 10.1007/s10826-013-9830-2.
- Bragazzi, N & Puente, G. (2014) . (A proposal for including nomophobia in the new DSM-V . *Psychol Res Behav Manag*, 7, 155–160. doi: 10.2147/PRBM.S41386.
- Cohen, K. (1989). *Psychometric Study of the Concept Alexithymia*. Electronic Theses and Dissertations . Doctoral Thesis, University of Windsor. <https://scholar.uwindsor.ca/etd/720>.
- Edwards, E. Shivaji , S. & Wupperman P. (2018). The emotion mapping activity: Preliminary evaluation of a mindfulness-informed exercise to improve. Scandinavian. *Journal of Psychology*, 59(3):319-327. DOI: 10.1111/sjop.12438
- Egyptian Central Agency for Mobilization and Statistics. (2014). *Internet users in Egypt* . https://www.capmas.gov.eg/Pages/IndicatorsPage.aspx?page_id=6134&ind_id=2262. 2-15-2021.

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

- Elkholy, H, Elhabiby, M & Ibrahim, I.(2020). Rates of Alexithymia and Its Association With Smartphone Addiction Among a Sample of University Students in Egypt, *Front. Psychiatry*, 24, (11). doi.org/10.3389/fpsyg.2020.00304.
- Franz , M. Popp, K .Schaefer, R. Sitte, W. Schneider, C. Hardt, J. Decker, O. & Braehler, E. (2008) . Alexithymia in the German general population .*Soc Psychiatry Psychiatr Epidemiol*, 43(1):54-62. doi:10.1007/s00127-007-0265-1.
- Frison, E., & Eggermont, S. (2015). The impact of daily stress on adolescents' depressed mood: the role of social support seeking through Facebook. *Computers in Human Behavior*, 44, 315–325. DOI:10.1016/j.chb.2014.11.070.
- Gao, T., Li, J., Zhang, H., Gao, J., Kong, Y., Hu, Y., & Mei, S. (2018). The influence of alexithymia on mobile phone addiction: The role of depression, anxiety and stress, *Journal of Affective Disorders*, (225), 1, 761-766. DOI: 10.1016/j.jad.2017.08.020
- Gharib, A. (1999). *Depression Scale (D) BID Instructions, reliability and validity studies, lists of criteria and cut-off scores 3rd*, Anglo-Egyptian Library.
- Grabe, HJ. Frommer, J. Ankerhold, A. Ulrich, C. Groger, R & .Franke, GH. (2008). Alexithymia and Outcome in Psychotherapy. *Psychother Psychosom*; 77,(3):189-94. doi: 10.1159/000119739.
- Ha, JH, Chin B, Park DH, Ryu SH, & Yu J.(2008). Characteristics of excessive cellular phone use in Korean adolescents. *Cyber psychol Behav Soc*, 11(6), 783-4. doi: 10.1089/cpb.2008.0096.
- Hao, Z & .Jin, L.(2020). Alexithymia and Problematic Mobile Phone Use: A Moderated Mediation Model .*Frontiers in Psychology; Psychol.*, (15) doi.org/10.3389/fpsyg.2020.541507.
- Hao, Z. Jin, L. Yan Li .Akram, H. Saeed, M .Jun Ma. Haibo Ma,. & Huang, J.(2019). Alexithymia and mobile phone addiction in Chinese undergraduate students: The roles of mobile phone use patterns, *Computers in Human Behavior*. (97), 51-59. doi.org/10.1016/j.chb.2019.03.001.

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

- Haviland, MG, Hendryx, MS, Shaw DG, Henry, JP. (1994). Alexithymia in women and men hospitalized for psychoactive substance dependence, *Compr Psychiatry*, 35(2):124–8. doi: 10.1016/0010-440X(94)90056-N.
- Honkalampi, K., Hintikka, J., Laukkanen, E., Lehtonen, J & ,Viinamäki, H. (2001). Alexithymia and depression: A prospective study of patients with major depressive disorder. *Psychosomatics. Journal of Consultation Liaison Psychiatry*. 42, 229–234. DOI: 10.1176/appi.psy.42.3.229.
- Ibrahim, A., & Askar, A. (2009). *Clinical psychology in the field of psychiatry*, 4th, Anglo-Egyptian Library .
- Kamibeppu, K. & Sugiura, H. (2005). Impact of the mobile phone on junior high-school students' friendships in the Tokyo metropolitan area. *Cyber psychol Behav.* (8), 121–130. doi: 10.1089/cpb.2005.8.121.
- Kaviani, F. Robards, B. Young, K. & Koppel, S. (2020). Nomophobia: Is the Fear of Being without a Smartphone Associated with Problematic Use? *Int J Environ Res Public Health*, 17(17): 6024. doi: 10.3390/ijerph17176024
- King, A. Valença, A & Nardi, A. (2010). Nomophobia: the mobile phone in panic disorder with agoraphobia: reducing phobias or worsening of dependence?. *Cogn Behav Neurol*, (1), 52- 54. doi: 10.1097/WNN.0b013e3181b7eabc.
- Lee, J .Wang , M .Luk ,T .Guo, N .Chan, S & Lam, T. (2020). Associations of Electronic Device Use Before and After Sleep With Psychological Distress Among Chinese Adults in Hong Kong: Cross-Sectional Study. *JMIR Mental Health*, 11;7(6):e15403. doi: 10.2196/15403.
- Li, S. Zhang, B. Guo, Y. Zhang, J. (2015). The association between alexithymia as assessed by the 20-item Toronto Alexithymia Scale and depression: A meta-analysis. *Psychiatry Res*, 30;227(1):1-9. doi: 10.1016/j.psychres.2015.02.006. Epub 2015 Feb 19. PMID: 25769520.
- McKenna, K. & Bargh, J. (2000). Plan 9 from cyberspace: The implications of the internet for personality and social psychology. *Pers Soc Psychol Rev*;4:57–75. doi.org/10.1207/S15327957PSPR0401_6.

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

- Mei, S .Xu, G .Gao, T .Ren, H & Li ,J. (2018). The relationship between college students alexithymia and mobile phone addiction: Testing mediation and moderation effects. *BMC Psychiatry*, (18), 329. doi: 10.1186/s12888-018-1891-8.
- Mohamed, O. (2019). Nomophobia and its relationship to psychological happiness and self-esteem among female student teachers in early childhood at the university *Journal of Childhood Studies, Ain Shams University, Faculty of Graduate Studies for Childhood*, (84), 22, 21-32. doi: 10.21608/JSC.2019.65311.
- Nemiah, J, Freyberger, H, & Sifneos, P. (1976). Alexithymia. A view of the psychosomatic process. *Mod Trends Psychosomatic medicine*; (3):430–439. DOI: 10.4236 / psych.2012.33032.
- Nowakowski, M. McFarlane, T.,& Cassin, S.(2013). Alexithymia and eating disorders: a critical review of the literature. *Eat Dis order*; 18;1-21. doi: 10.1186/2050-2974-1-21.
- Ozdemir,B,. Cakir, O,. & Hussain, I.(2018). Prevalence of Monophobia among University Students: A Comparative Study of Pakistani and Turkish Undergraduate Students, *Journal of Mathematics, Science and Technology Education*, 14 (4),1519-1532. doi.org/10.29333/ejmste/ 84839.
- Park, Y. Kyung Kim, M. & Park, J. (2016) .Mobile phone dependency and its impacts on adolescents social and academic behaviors *.Computers in Human Behavior*, (63), 282-292. doi.org/10.1016/j.chb.2016.05.026.
- Pooja, N,. Kajal U,. Supriya Y,. Reshma,. T & Shailaja,. G. (2016). Are Student Becoming Salves of Technology?, *International Journal of Advanced Research*, 4(9), 601-605. DOI: 10.21474/IJAR01/1524.
- Rodríguez-García, A. Moreno-Guerrero, A. & Belmonte, J. (2020). Nomophobia: An Individual's Growing Fear of Being without a Smartphone—A Systematic Literature Review .*Int. J. Environ. Res. Public Health. Public Health*, (17), 580, 1-19. doi: 10.3390/ijerph17020580.
- Samaha, M. & Hawi , N.(2016). Relationships among smartphone addiction, stress, academic performance, and satisfaction with life *.Computers in Human Behavior*, (57), 321-325. doi.org/10.1016/j.chb.2015.12.045.

Nomophobia As An Evidence For Alexithymia And The Depression For Secondary School Students

- Schimmenti, A., Passanisi A, Caretti V, La Marca L, Granieri A, Iacolino C, et al.(2017). Traumatic experiences, alexithymia, and Internet addiction symptoms among late adolescence: A moderated mediation analysis. *Addict Behav*, 64:314–20. doi: 10.1016/j.addbeh.2015.11.002
- Scimeca, G., Bruno, A., Cava, L., Pandolfo, G., Pandolfo, G. & Zoccali, R.(2014). The Relationship between Alexithymia, Anxiety, Depression, and Internet Addiction Severity in a Sample of Italian High School Students. *The Scientific World Journal* (2014), Article ID 504376, 1-8. <https://doi.org/10.1155/2014/504376>.
- Sharma, M., Mathur, DM, & Jeenger J.(2019). Nomophobia and its relationship with depression, anxiety, and quality of life in adolescents. *Ind Psychiatry J*, 28(2):231-236. doi: 10.4103/ipj.ipj_60_18, PMID: 33223716; PMCID: PMC7660011.
- Taylor, GJ, Bagby, RM, Parker, JD.(1991). The alexithymia construct: A potential paradigm for psychosomatic medicine. *Psychosomatics*, 32:153–64. doi: 10.1016/S0033-3182(91)72086-0.
- Timoney, L. & Holder, M. (2013). Correlates of alexithymia, Emotional processing deficits and happiness, *Springer Netherlands, Dordrecht* (2013), 41-60. https://08101mxu3-1106-y-https-doi-org.mplbci.ekb.eg/10.1007/978-94-007-7177-2_6.
- Yang, X. Zhou, Z. Liu, Q. & Fan, C. (2019). Mobile Phone Addiction and Adolescents' Anxiety and Depression: The Moderating Role of Mindfulness, *Journal of Child and Family Studies*, (28), 822–830. <https://doi.org/10.1007/s10826-018-01323-2>
- Yavuz, M., Beyza, A., Bayrak, B., Gündüz, M & Nurullah, B.(2019).The relationships between nomophobia, alexithymia and metacognitive problems in an adolescent population. *The Turkish Journal of Pediatrics*, 61, 345- 351. DOI : 10.24953/turkjped.2019.03.005.
- Yildirim, C. & Correia, A.(2015).Exploring the dimensions of nomophobia: Development and validation of a self-reported questionnaire. *Computers in Human Behavior*, 49, 130-137. doi.org/10.1016/j.chb.2015.02.059.
- Zaid, M.(2015). *Correlation and Regression Analysis Text Book*. The Statistical, Economic and Social Research and Training Center for Islamic Countries.

النوموفوبيا كدالة للألكسيثيميا والاكتئاب لدى طلاب التعليم الثانوى

د. صفاء أحمد عجاة

مدرس الصحة النفسية
كلية التربية جامعة الزقازيق

د. دعاء فتحى مجاور

مدرس الصحة النفسية
كلية التربية جامعة طنطا

المستخلص

النوموفوبيا: اضطراب وفقدان الراحة، وظهور القلق نتيجة عدم تواجد الهاتف الذكى الذى اعتاد الطالب على تواجده معه باستمرار، وخوف من فقد الاتصال بالشبكة أو بالمعلومات، وخوفه من فقد التواصل مع الآخرين من خلال الهاتف الذكى. ويهدف البحث الحالى إلى التحقق من العلاقة بين النوموفوبيا والاكتئاب والألكسيثيميا. والألكسيثيميا تشير إلى الأشخاص غير المرضى (الكلينيكين). وتتمثل في وجود صعوبات فى وصف المشاعر، وتحديدتها، والتوجه نحو التفكير الخارجى. وتم استخدام المنهج الوصفى الارتباطى التنبؤى. وتكونت العينة من (٣١٠) طالبًا وطالبة، وتراوحت أعمارهم الزمنية ما بين: (١٥ - ١٨) عامًا، وهذه العينة تم اشتقاقها من ثلاث مدراس ثانوية بمدينة طنطا. وقامت الباحثات بتطبيق استبيان النوموفوبيا Nomophobia Questionnaire (NMP-Q) إعداد/ (Yildirim & Correia, 2015)، ومقياس تورونتو للألكسيثيميا Toronto Alexithymia Scale (TAS) بعد إعدادهما للغة العربية، واستبيان بيك للاكتئاب Beck Depression Inventory (BDI) ترجمة/ (غريب عبد الفتاح، ١٩٩٩). وأظهرت النتائج: وجود معاملات ارتباط موجبة ودالة إحصائياً بين النوموفوبيا والألكسيثيميا والاكتئاب، أشارت نتائج تحليلات الانحدار التدرجى المتعدد بطريقة Step Wise إمكانية التنبؤ بالنوموفوبيا من خلال الدرجات الكلية للألكسيثيميا والاكتئاب. وتمت مناقشة النتائج فى ضوء الإطار النظرى والدراسات السابقة التى تم الاطلاع عليها، وقمنا بصياغة بعض التوصيات والمقترحات.

الكلمات المفتاحية: النوموفوبيا- الألكسيثيميا- الاكتئاب- الهاتف الذكى- المراهقين.

تاريخ إستلام البحث : ٢٥ / ١٢ / ٢٠٢١ تاريخ قبول البحث : ١١ / ١ / ٢٠٢٢ تاريخ النشر الإلكتروني : ١٢ / ٢٠٢١