

Impact of Social Media on Mental Health among Medical Students of Private Medical College, Sargodha

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ABSTRACT

Objective: To evaluate the degree of impact and relationship between the use of the social media on student's mental health.

Study Design: Descriptive cross sectional study

Place and Duration of Study: This study was conducted at the Medical Students of Rai Medical Collage, Sargodha Pakistan from 10 March 2020 to 10 May 2020.

Materials and Methods: The sample of the study was selected through non-probability volunteer sampling techniques. It was consisting of 150 WhatsApp users comprising of 41 male and 109 female students. Data were collected through a self-developed questionnaire WhatsApp use patterns questionnaire (WUPQ) for measuring the uses of social media networks. To measure the depression and anxiety level of the respondents Hospital Anxiety and Depression Scale (HADS) was used.

Results: Results shows social media usage has positive and significant correlation with mental health.

Conclusion: A proper formatted assessment for these psychological abnormalities must be part and parcel of all such programs with special focus on underline causative role of non-judicious use of social media.

Key Words: Social media, mental health, anxiety, depression

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INTRODUCTION

Social media is the latest technological engine for the virtual and real time sharing. It's find its application among common interest's groups, shared sociopolitical groups and professionals, being the few examples. Its user friendly programming has almost hypnotized more than half of the internet users who are daily surfing the social media, out of 7.5 billion total net connect people 4 billion are hooked¹.

Pakistanis are following the trend, Pakistan telecommuting authority PTA has recently announced to connect 70 million users through it landline, 3G, 4G and recently broadband services. Facebook has emerged the leading social media platform² while twitter and my space follow it closely, many at time people use all three.

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The social media has proven its capacity to influence the public opinion, be it cultural, social trend and fashion, religious and political views by overwhelming the intelligentsia by continues bombarding of information skewed to their wastage interest. like all other phenomena when you deviate from "AITDAAL", under users are left behind while over users are intoxicated. It's a common observation that children, adolescents and our youth are easily and deeply influenced by any new idea. There are not mature and enough and educated enough to critically analyzed this flood of information. The continuous indulgence leaves very little space for reflection, the most important and high grade intellectual factor in personality development. This over indulgence leads to addictive attachment to the social media. All the recent literature focuses on this negative impact manifest as withdrawal from closed family and friends circle, loss of tolerance to the challenging viewpoints, behavior problems³ in family social and school interaction. Irresistible urge of salience when not backed by the proper educational and intellectual background leads to personality disorders and mood disorders.

Facebook accomplished more than 500 million active subscriptions in 2011 with sharp upward future projections in Pakistan 44 thousand new users subscribe to Facebook every week⁴. These networks are latest weapon for all the interest's groups in sociology, politics, business. As more and people are being

approached and influenced by social media especially adolescent and young groups, its impact on interpersonal relationships, personality development and mental health leads to be critically evaluated. This is extremely Important to keep our interwoven fabric of national, cultural and religious ideologies intact⁵. Social scientist and psychologist have pointed out the negative impact of this addictive attachment to social media manifesting as well-known personality deficiencies like loneliness and narcissism and psychological diseases like anxiety, depression and compulsive behavior⁶. College youth is known to be moody age group when they are unhappy and low in mood they are depressed when they are under pressure of studies, competition, the routine up and down of interpersonal relationships they become anxious and tense. Though the social media has connected them very well with the family friends and groups of common interests but it has come at the cost of emotinol and physical closeness, a vital component of personality development. Romantically speaking they don't have a personal to hug with and don't have a shoulder to cry on. On the other hand, the larger expression of yourself, your intellectual work, your achievements are shared on a much larger platform through social media⁷.

Depression and anxiety are interconnected two bars of a seesaw one may, stay into depression for a variable period and or may roll into anxiety or swing between the two states many times a day. The subjective feeling of tension, apprehension and un-necessary worry are the unpleasant emotional state called anxiety, it is caused by uncontrolled activation of the sympathetic nervous system. These daily mood swings greatly hamper the academic and co-curricular achievement. Poor school attendance, difficulty in concentration lack of motivation and interest are commonly blamed by the students on range of physical symptoms like headache, appetite and GI issues, sleep disturbances, muscle aches and pain and so on so forth.

MATERIALS AND METHODS

Study Design: Descriptive cross sectional study

Methodology: Quantitative correlation research design was adopted following the pragmatist research paradigm. The respondents of the study were investigated in relation to the use of social media and Depression. The respondents of the study were consisting of all the Medical Students of Rai Medical Collage, Sargodha Pakistan. The selection of the respondents was made on the bases of the opportunity they have in using WhatsApp and their trends towards social media. Due to time and resources constraints the study was delimited to Medical Students of Rai Medical Collage, Sargodha. The sample of the study was selected through non-probability volunteer sampling techniques. It was consisting of 150 WhatsApp users comprising of 41 male and 109 female students. Data

were collected through a self-developed questionnaire WhatsApp use patterns questionnaire (WUPQ) for measuring the uses of social media networks. To measure the depression and anxiety level of the respondents Hospital Anxiety and Depression Scale (HADS) was used. Data were collected personally by the researcher from the students. The collected data was placed into SPSS. 22 and the relationship between variables were predicted by Correlation, ANOVA and descriptive analysis.

RESULTS

Table No.1: Pearson Correlation for the role of use of the social media and mental health

Variables	F	%
Gender		
Male	41	27.3
Female	109	72.7
Current Education		
Third Year	48	32.0
Forth Year	37	24.7
Final Year	65	43.3
Lower-middle	2	1.3
Middle	101	67.3
Upper-Middle	28	18.7
Upper	13	8.7
Whatsapp usage per-day		
1-2h/day	27	18.0
3-5h/day	43	28.7
6-7h/day	12	8.0
over 8h/ days	68	45.3
Content of current feature of whatsapp used by sample		
Test message	122	81.3
Photos	11	7.3
Videos	7	4.7
Forwarding info	10	6.7
What social networking platform do you use most?		
Facebook	34	22.7
Whatsapp	76	50.7
Others (Instagram etc.)	40	26.7

(N=150)

*p<0.005

	Variables	1	2
1	WUPQ	-	.168*
2	HADS	.168*	-

WUPQ= WhatsApp Use Pattern Questionnaire and HADS= Hospital Anxiety and Depression Scale.

Psychometric properties of variables include mean, standard deviation, and alpha reliability. The relationship between variables was predicted by Correlation, ANOVA and *t*-test. The target sample of study was one-hundred and fifty students.

Table 1 shows social media usage has positive and significant correlation with mental health. It means as WhatsApp usage increases risk of Anxiety and Depression increases.

Table 2 shows Pearson Correlation for the role of use of the social media and mental health. Most the variables show positive and significant correlation with each other. While use of social media and depression shows a negative and non-significant correlation.

Table No.2: Pearson Correlation for the role of use of the social media and mental health. (N=150)

Variables	1	2	3	4
1 WUPQ	-	-.010	.229**	.168*
2 D	-.010	-	.213**	.347**
3 A	.229**	.213**	-	.392**
4 HADS	.168*	.347**	.392**	-

Table 3 shows the relationship of between number of hours students spend on social media and its impact on

Table No.4: One-way ANOVA for Socio-economic status along Study Variables (N=150).

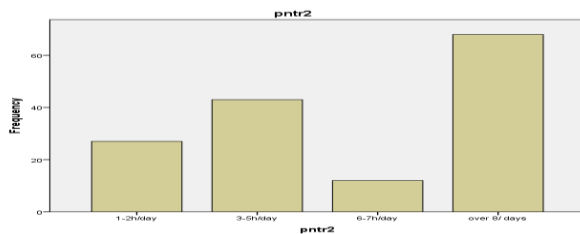
Variables	Category 1 lower-middle (n = 2)		Category 2 middle (n = 101)		Category 3 upper-middle (n = 28)		Category 4 middle (n=13)		95%CI		F	P
	M	SD	M	SD	M	SD	M	SD	LL	UL		
	WUPT	24.00	1.41	24.26	2.38	23.85	2.25	24.23 2.3	11.29	38.70		
HADS	15.00	8.48	11.70	4.54	10.2	4.03	11.76 4.32	-61.23	91.23	1.22	.305	

WUPQ= WhatsApp Use Pattern Questionnaire and HADS= Hospital Anxiety and Depression Scale.

Table No.5: Frequency hours/day students spends on using WhatsApp.

WhatsApp usage per-day	Frequency	Percent
1-2h/day	27	18.0
3-5h/day	43	28.7
6-7h/day	12	8.0
over 8h/ days	68	45.3

This table depict that 27 students use 1-2h/day Whatsapp, 43 students uses 3-5h/day, 12 students use 6-7 h/day and 68 students use over 8h/day.



Bar Chart No.1: Bar-Chat representation to show the frequency hours/day students spends on using WhatsApp.

Table 6 shows the prevalence rate of mental illness among sample. Mental health of about 29 students was recorded to be normal while, 54 of the students were at borderline and 67 students were observed being suffering from mental illness.

their mental health and depicted a positive and significant correlation between both variables as the hours of time spend on social media increases the risk of mental illnesses increases.

Table No.3: Relationship of between number of hours students spend on social media and its impact on their mental health

Variables	HADS	pnr2
HADS	1	.335**
pnr2	.335**	1

Table 4 depicts that all variables show non-significant relationship with socio-economic status

Table No.6: The prevalence rate of Depression and Anxiety

HADS Scores	Frequency	Percent
Normal	29	19.3
Borderline	54	36.0
Abnormal	67	44.7

DISCUSSION

Our result need to discuss. Time usage and mental health irrespective of time spent and how much time spent with depression.

Like any other technology both positive and negative uses and their implication remains in the spot light of mass media, same applies on the impact of social media on students. In the conservative societies like ours were even the loud and bold expression of normal ideas raises eyebrows. The IT industry naturally will always highlight the positive side of the social media usage. It is the role of mental health scientist and social scientist to pin point and highlight the negative impact of the excessive addictive use of social media especially among the youth like college students Rosen, Cheever, and Carrier⁸ coined the term i-Disorder to describe the negative relationship between internet usage and psychological health. 45% of students in ours study reported more than 8 hours of daily WhatsApp use, at par with their Indian counterpart in Chennai⁹. This purposeless and almost addictive over view of smart

phone results in time distortion. Like the karachites our medical students spend most of the time on text messaging rather than academic search and sharing. Our students chat more frequently on WhatsApp (81%) while the poor African country Ghana reported 72% daily time on text messaging. This cross-sectional report is good enough to sound the alarms in teachers and parental communities. In another study on college student's the different variables of FB usage like time spent, number of friends, use for image management and use for general information or relevant academic searches were analyzed. It was found that these have a strong relationship and their excessive and non-productive use has a strong predictive ability for anti-social personality disorder, major depressive disorder, bipolar mania, compulsive disorder and narcissism and even dysthymia⁸⁻¹¹.

The negative role of excessive social media use on mental well-being has been documented by multiple studies¹². The problem starts with the purposeless use, non-productive sharing and excessive time spent. Rosen et al¹³ reported that our virtual generation has become addicted to the habit of checking messages impulsively. This has been termed as phantom Vibration Syndrome (PVS) where PVS⁵ victim is obsessed with frequently checking the messages and have a knee jerk reflex for vibration alerts of the messages and exhibit anxiety when stopped from doing so like in a class room or during meeting. The Hearty Soul¹⁴ reported a direct relationship between the time spent and depression. They also reported that Fb and twitter time doesn't help student's in reducing the stress and staying more focused.

The positive aspects of social networking in the era of science and technology and its implication for the students in term of positive use cannot be neglected or downplayed. Kaur and Bashir reported the ease of socialization, broader communication, unlimited learning opportunities and access to health information especially sexual health as the positive effect of these networking facilities.⁹ Depression, online harassment, cyber-bullying, fatigue, stress, suppression of emotional and decline of intellectual ability where described as the major negative effects. Strickland¹⁵ pointed out that 11 to 18 old youth being the most active user are at the highest risk of developing mental health issues, anxiety and or depression being the most prevalent and directly related to the time spent on social media, FB¹⁶ in their study. Davila⁴ reflected that severe depression in young individuals with it associated reduced interpersonal interaction and social isolation can even lead to suicidal tendencies^{4,17,6}. As expected Reich et al.¹⁸ documented the pivotal role of social relationships with better mental health. A good friend circle, real not the virtual is the best cushion to absorb the emotional traumas of day to day life¹⁹.

CONCLUSION

A safe health and productive use of social media must have addressed its impact on mental health personality development and achieving full potential of any youth especially the high school, collages and higher professional educational institutes. The issue of addictive hooking, non-productive use sexting/texting, physical social isolation and reduced time allocation for physical activities must be the part and parcel of all carrier development counselling, motivational programs and poor academic performance remedial programs must address these core issues. A proper formatted assessment for these psychological abnormalities must be part and parcel of all such programs with special focus on the underline causative role of non-judicious use of social media.

Author's Contribution:

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