

Research Article

Relationship Between Social Support, Social Media Usage, and Psychological Well-Being among Undergraduates in Different Institutions of Punjab

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Abstract

Background: Social media is like a magnanimous tree and us being leaves connected through twigs of imagination. Today 4.33 billion people are connected to the internet, and almost all do by using their mobiles. In Pakistan, there were 71 million broadband subscribers and 69 million 3G/4G users in June 2019.

Aims & Objectives: The current study aimed to find the relationship between social support, social media usage, and psychological well-being among undergraduates aged 18-25 years.

Methods: A sample of eight hundred and forty-three male and female students was included in this research. A stratified random sampling technique was applied in the research. The sample was taken from departments of various institutions in Lahore. The duration of the study was 6 months. The study was a cross-sectional study and the data were collected using questionnaires based on Ryff's scale of psychological well-being, Media and Technology Usage and Attitudes Scale, and Inventory of Social Supportive Behavior (ISSB) scale.

Results: The data were analyzed on SPSS 25 and the results indicated that social support received from close ties was positively correlated with psychological well-being [$r(841) = .523, n = 843, p < .001$]. At the same time, social support received from online sources had no significant impact on psychological well-being while social media usage was negatively correlated with psychological well-being [$r(841) = -.215, n = 843, p < .001$]. Using the regression analysis technique, the three variables in combination explained 34.6% of the variance in psychological well-being [$R^2 = 0.346, F(6, 836) = 75.37, p < 0.01$]. Age and gender had no significant effect.

Conclusion: These findings implicate that healthy interpersonal relationships between close ties and undergraduate students should be encouraged and controlled usage of social networking sites should be practiced.

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Introduction:

The Internet has overshadowed our lives, from houses to schools, offices, and even shopping malls. SNSs (social networking sites) are defined as online administrations that are generally inexpensive and enable individuals to assemble an open or semi-open

profile inside a virtual framework.¹ Profiles are novel pages where one can type oneself into existence.²

Today's social media, which includes blogs, wikis, media (audio, photo, video, text) sharing tools, networking platforms, and various other SNSs³, has added a whole new dimension to the world web. Today's college students

(generation Y) are exposed to all the aforementioned technologies and online SNSs have become widely popular among them. Despite evidence of the potential benefits of social media, it may be harmful to one's mental health and well-being.⁴

One way to grasp the idea of social support is to examine the size of social networks around the individual and the number of links that we have with other people, family members, friends, acquaintances, and others.⁵ But at the same time person who is enjoying a lot of social contacts doesn't guarantee that he/she is enjoying social support or the social network around him/her.

Personality is the main factor in deciding the way individuals act over the web.⁶ The age between 18-25 years is critical to an individual's emerging concepts of mental maturity. At this age, an individual learns and builds long-term social abilities.⁷ The students of Pakistan and youth, in general, are feeling more and more isolated with time. There's a huge gap in understanding between generation X and generation Y. Due to this gap, parents are unable to address the social and emotional requirements of students and then, they turn to SNSs to fulfill their needs.⁸ When a person obtains good social support, it has a positive effect on the health and well-being of the person and also reduces the stress level. A low-stress level is reported in those people who received good social support.⁹ SNSs are the only source of social support common in today's youth, SNSs usage increases, and by getting more involved in these platforms, the excessive usage results in lesser face-to-face communication and lesser time spent with family and close ties. Most people become habitual users of the internet because they think that online friendships or relations are much better and trustworthy, less negatively judgmental, and more focused.¹⁰ Now, if substitution is occurring with more and more communication with weaker ties, crowding out communication with stronger ties, the increased social media usage decreases the true social support of family and strong ties and can negatively affect the PWB of a person.¹¹

There is a psychological link between the internet, mental health, and interpersonal interaction at individual levels.¹² This study was conducted to understand this link.

There is an increasing trend of social media usage in Pakistan. No study with such a large sample has been

conducted before in Pakistan. The main aim of this study is to find out the relationship between social media usage, social support, and the psychological well-being of undergraduates. This aim was achieved through the objectives of collecting the data from a large group of selected individuals using questionnaires and thus analyzing all the collected data for achieving the desired aim of reaching specific conclusions. This research compares male and female social media usage in Pakistan. A comparison of social media usage in different study groups and systems was also made in this study. A large number of social networking websites were made a part of this study, because of an abrupt increase in social networking sites.

The hypothesis ensued in light of the mentioned literature are as follows,

H1: There is a positive association between the amount of social support received from close ties and psychological well-being.

H2: The amount of social support from online sources will predict the amount of social media usage.

H3: There is a negative association between social media usage and psychological well-being.

Methods:

A questionnaire survey was carried out among undergraduates of several prominent institutions of Lahore, Gujranwala, and Bhakkar. The research methodology in this study includes Participants, Measuring instruments, and Data collection procedures.

Students of different universities and colleges in the aforementioned cities were a heterogeneous population. Selecting the sample from diverse institutions and fields was meant to ensure that a balanced representation of undergraduates is being taken and also to fortify the external validity of our study. About 1,000 questionnaires were distributed out of which 843 were deemed appropriate for analysis

The questionnaires were distributed using a Stratified sampling technique to prevent over or under-representation of the sample. Firstly, the population of the relevant departments from the institutes was divided according to the study years of their respective courses then random samples were taken from students of each year. Hence, each course of study represents students of all

years.

Permission of conducting research was sought from the university administration and all other concerned authorities. Consent forms were attached with questionnaires. Participation in this study was voluntary with no extrinsic motivation. Respondents were allowed to take as much time as they required. The whole procedure of taking the sample from different institutions took a total time of 2 months.

The eligibility criterion for the participants was that they were:

- All between the ages 18-25 years
- All able to read and understand English
- All able to give informed consent

The research design was cross-sectional in nature. The study was conducted using three sets of measures in addition to demographics.

Demographic variables such as age, gender, qualification, and name of the institution were collected.

To measure PWB (psychological well-being), Ryff's scale of psychological well-being has been used which is considered to be the gold standard in measuring PWB worldwide. The 42-item version was used and it had 6 subscales. Each scale consisted of 7 items. The scale is a Likert-type scale in which responses are recorded in 6 categories from (1 = strongly agreed to 6 = strongly disagreed). Some of the items were reverse-coded. Higher scores indicated higher PWB.

The Media and Technology Usage and Attitudes Scale¹³ was used for calculating social media usage. The scale contained frequently used SNSs of Pakistan, with a Likert type response format consisting upon 11 categories (Figure 1). The score was calculated by adding up the individual scores of each website. Higher score indicated more social media usage. This scale can also be modified to include other social media platforms.

The Inventory of Social Supportive Behavior (ISSB) is a 40-item scale used to assess the social support received by the students. To test the fact that social support influences the SMU and PWB, it was necessary to pinpoint the social support of the individual received from online sources and close ties (family or relatives). A well-directed approach¹⁵ developed by Heewon Kim

was used for this purpose. In this approach, behaviors, which can be performed, both in an online context and live situations (informational and emotional support) were retained and the rest of the items (instrumental) were removed from the scale as these cannot be performed in an online context. This approach contributed to the prevention of survey fatigue, which is the cause of missing values given that ISSB has been employed for two different contexts. The participants were asked to respond to these items in reference to the last 4 weeks. The scale was Likert type with several categories (1 = not at all to 5 = about every day).

The social media usage and social support were the independent variables while psychological well-being was the dependent variable. Three methods of data analysis were used in this study. Descriptive statistics were used to arrange the data in a more comprehensible way. Cronbach's alpha of all scales was measured to determine robust internal consistency of scales. A Pearson product-moment correlation (PPMC) was conducted to find out the relationships between the studied variables and after that Hierarchical Regression Analysis was carried out to predict and quantify those relationships, as there were more than one independent variables being assessed. The data was analyzed using Statistical Package for the Social Sciences (SPSS 25.0).

Results

The data were analyzed for eight hundred and forty-three male and female students that were included in this research. Respondents consisted of 59% females and 41% males. The age of respondents ranged from 16-25 years (M = 17.07, SD = 1.39).

The internal consistency of items present in our measuring instrument was very good. (Table 1)

The study population showed the frequent usage of different SNSs as shown in Figure 1.

Figure: 01 shows Whatsapp as the most used platform among the selected population with a percentage of 90% and skype as the least used social media platform with a percentage of 18%.

The descriptive statistics as shown in Table: 02 indicated the average, standard deviation, minimum and maximum values, and ranges of different variables including age, psychological well-being, social media usage,

Table 1: Reliability Analysis

Scales	Cronbach's alpha	Number of items
Social media usage	0.787*	9
Psychological well-being	0.798*	42
Online social support	0.877*	11
General social support	0.815*	11

* Reliable as it is $\geq 70\%$

online social support, and general social support.

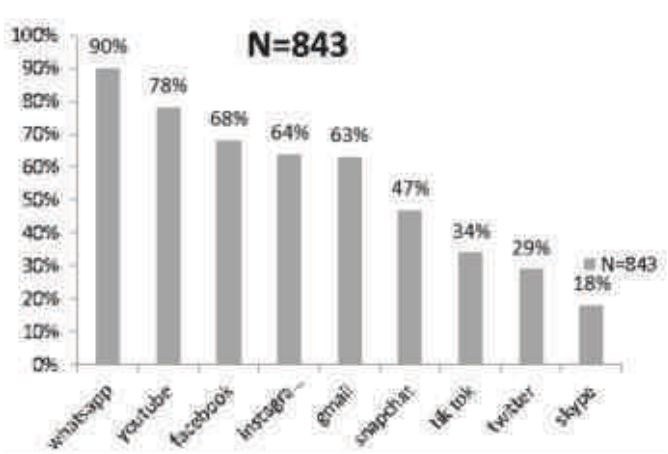


Figure 1: Most Frequently used SNSs Among the Study Population

Table: 03 shows the population of selected undergraduate students belonging to different institutions. This table indicates that most of the respondents were pre-medical students with a percentage of 24.1% and the least respondents belonged to the IER (institute of education and research) field with a percentage of 3.91%.

PPMC was conducted to measure the relationships between the dependent and independent variables. It showed that a strong positive correlation exists between PWB and GSS which is statistically significant at 0.05

Table 2: Descriptive Statistics of all Variables Used in Research

	Mean	Standard deviation	Min.	Max.	Range
Age	17.07	2.05	16	25	9
Psychological well-being	167.2	21.61	101	236	135
Social media usage	41.8	17	9	99	90
Online social support	33.3	10.01	11	55	44
General social support	38.7	8.30	15	55	40

confidence level $[r(841) = .523, n = 843, p < .001]$.

According to Guilford 1956, the relationship is substantial as the result is .523 14, the relationship is substantial as the result is .523. A weak negative correlation exists between SMU and PWB $[r(841) = -.215, n = 843, p <$

Table 3: Demographics of the Participants According to their Gender and Educational Field

	f	Percentage
Gender	Male	346 41%
	Female	497 59%
Educational level	Pre-medical	204 24.1%
	Pre-engineering	39 4.62%
	MBBS	84 9.96%
	Nursing	59 6.99%
	IER	33 3.91%
	Biochemistry	82 9.73%
	Mechanical engineering	76 9%
	Bachelor of Nutrition	89 10.6%
	Pharmacy	88 10.43%
	MLT	89 10.6%
n	843	

.001]. It was found that no substantial correlation exists between social support gained from online sources (OSS) and the PWB of an individual. The result showed that there is a strong positive effect of social support received from close ties on the PWB of an individual. The results are shown above in Table: 04.

Table 4: Correlations among Different Variables

	Total PWB	Social media usage	Online support	General support
Total Pearson correlation	1	-.215**	.036	.523**
Sig. (2-tailed)		.000	.292	.000
n	843	843	843	842

** Correlation is significant at the 0.01 level (2-tailed)

A hierarchical regression analysis was carried out to find out the individual variances of our two sets of variables on PWB: (1) the demographics (gender, age, and qualification); (2) the predictor variables (OSS, GSS, and SMU). After controlling the demographic variables in block 1, the predictor variables were put in block 2. Age and gender didn't produce a statistically significant contribution to the criterion variable. Qualification only didn't predict a statistically significant

variance [$\beta = -.104$, $t(839) = -3.010$, $p < .001$]. By controlling the effects of age, gender, and qualification, variables of our study (OSS, GSS, and SMU) mentioned in block 2 of Table 5 explained 34.6% of the variance in the sample. The GSS made the most significant unique contribution to our model [$\beta = -.570$, $t(839) = 18.848$,

Table 5: Result of Regression Analysis With PWB as Criterion Variable ($N = 843$)

Variables	Standardized coefficients (β)	t	R ² change	F change
Model 1			.041	11.885
Block 1 Gender	.014	.418*		
Age	-.002	-.052*		
Educational level	-.199	-4.833		
Model 2			.310	133.25
Block 1 Gender	-.026	-.928*		
Age	-.012	-.339*		
Educational level	-.104	-3.010		
Block 2 Social media usage	-.164	-5.256		
Online social support	-.119	-3.800		
General social support	.570	18.848		
Note: * p > .05				

$p < .001$]. The model 1 had only slight explanatory power [$R^2 = 0.037$, $F(3, 839) = 11.89$, $p < 0.01$] while model 2 had a significant explanatory power [$R^2 = 0.346$, $F(6, 836) = 75.37$, $p < 0.01$]. The overall R^2 of the regression model 2 was .346, which means all the predictors combined accounted for 34.6% of the variance in the sample.

Discussion:

The first hypothesis of this study proposed that a positive association exists between the amount of social support received from closer ties and PWB. Results indicated that the first hypothesis of this study was accepted; social support appeared to be a strong predictor of PWB. The results are supported by various researchers who found that positive effects are predicted by family closeness and social support provided. A study by Kim and Heewon explained a similar finding that social support received from closer ties has a significant effect on life satisfaction and psychological well-being¹⁵. Steinfield

et al. explained that internet usage for communication with strong ties increases the amount of social support and this improves the positive aspects of well-being.⁷ He, Zhou, Li, Cao, & Guan found out that social support is negatively correlated with loneliness.¹⁶

The second hypothesis suggested that social support from online sources and social media usage are linked. The result of this study is inconsistent with several previous studies. According to Lin et al. social media users experience an increase in social capital provided social support is given.¹⁷ In a study conducted by Benvenuti & Mazzoni, online social support has a positive correlation with functional internet usage.¹⁰ Abdulahi et al. explained that excessive social media usage can have negative health outcomes.² Utz & Breuer found out in their study that users of SNSs get more social support than non-users.¹⁸ Berry et al. report in their study that posting about daily activities predicted an increase in positive effects on self-esteem.

The third hypothesis in this study proposed that there is a negative association between psychological well-being and social media usage. Hypothesis 3 is supported because the results show a negative relationship between the two variables. But the association is a weak one, the findings are also consistent with previous literature with some studies supporting it while others refuting this relationship. There is a significant association between social media usage and depression which affects the mental well-being of an individual.¹⁷ Social media and social networks negatively affect the mental, physical and psychological health of the student.¹⁹ In a systematic review done by Erfani & Abedin, on the impacts of the use of SNSs on the PWB of users, twenty-two researches were studied. Sixteen studies showed a positive effect of SNS use on the PWB of users.²⁰

Limitations and Recommendations

The study also has some limitations. The sample consisted of students only, excluding the working-class youth. It is a cross-sectional study design that doesn't imply causation. Young teenagers were not included in the study. The study group comprised individuals 18-25 years of age. Other factors affecting PWB such as marital status and socioeconomic status were not considered. The data given is the one perceived by individuals who may be prone to errors.

This study can be improved through the following recommendations. More longitudinal design-based studies are required to evaluate the relationships mentioned in the current study. The users must have a sound knowledge of the primary policies of the SNSs they use regularly. If the students use the SNSs platform in a balanced way, it can help in preventing negative outcomes.

Conclusion:

The study conducted was based on the investigation of the relationship between social media usage, social support, and PWB among undergraduates. This research also shows a comparison between the social media usage of males and females in Pakistan. The results indicated the presence of a significant relationship between social support and PWB. No study with such a large sample group has ever been conducted in Pakistan. The study can be improved by including a diverse population and dividing the opinions of the population sets based on their age groups; Thus, this research can be studied extensively based on the outlook of different population levels (i.e., from puberty to maturity level).

Ethical Approval: Given

Conflict of Interest: The authors declare no conflict of interest.

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