

Influence of Compounded Social Stigma and Mental Health on Mental Health Help-Seeking Attitude as Mediated by Coping Strategies and Mental Health Awareness: Basis for a Program Dissertation Instruments Pilot Testing Data Analysis Outputs

Thank God Amukele Mahel, PhD, LCP, CRS

Adventist University of Philippines, Philippines

ORCID: <https://orcid.org/0000-0003-0690-9509>

DOI: <https://doi.org/10.47772/IJRISS.2026.10200286>

Received: 22 February 2026; Accepted: 28 February 2026; Published: 07 March 2026

ABSTRACT

Achieving research quality and contributing to the body of knowledge is a hallmark of credibility and dependability of research instruments used by scholars. Subsequently, conducting a pilot study to obtain the validity and reliability of the study data gathering instruments is indispensable. This is even more crucial when considering mental health challenges that affect the lives and academics of university and college students. Therefore, to determine the trustworthiness of the proposed dissertation research study instruments, the pilot study was conducted. Cronbach's alpha method of data analysis was used in scale reliability computations. The descriptive statistics helped in describing the preliminary pilot study outcomes. Thus, the findings revealed that the conceptualized elements meet the acceptable threshold of internal consistency. This indicates that proposed instruments have the capacity to measure the compounded social stigma, mental health, coping strategies, mental health awareness, and mental health help-seeking attitude of university undergraduate students. Hence, it was concluded that the instruments can be utilized in the dissertation study to achieve the study objectives.

Keywords: Compounded Social Stigma, Mental Health, Coping Strategies, Mental Health Awareness, Mental Health Help-seeking Attitude

INTRODUCTION

Reliability analysis (RA) is a crucial statistical procedure used to evaluate the consistency, stability, and dependability of datasets and measurement methods (Izal et al., 2023). RA plays a vital role in fields where precision in measurements and data is essential, such as psychology, education, healthcare, and market research. The major use of RA is to determine whether the measurements or data are reliable enough to draw conclusions or make decisions with confidence (Krippendorff, 2004).

This study reports the preliminary pilot testing outcomes on the compounded social stigma (self-stigma, self-image negative stigma, public attitudes to stigma), mental health status (depressive symptoms, anxiety, and stress), coping strategies, mental health awareness, and mental health help-seeking attitude constructs. Compounded social stigma entails the experience of undesired differentness that manifests through self-stigma, negative self-image stigma, and public attitudes to stigma, with the potential to cause mental health and psychological stereotypes and isolation due to a person's cultural and social environments' attributions. Compounded social stigma is integrated in this paper because stigma possesses comorbidity characteristics that occur individually and in social environments.

Subsequently, the compounded social stigma (self-stigma, self-image negative stigma, public attitudes to stigma), mental health status (depressive symptoms, anxiety, and stress), coping strategies, mental health awareness, and mental health help-seeking attitude constructs are conceptualized in the main dissertation research project to fulfill the requirements for a Doctor of Philosophy in Psychology program.

LITERATURE REVIEW

This paper investigates the influence of compounded social stigma and mental health challenges on the mental health help-seeking attitude of undergraduate university students in the Philippines.

The study by Bantjes et al. (2020) found that only 35% of college students who reported suicidal thoughts or behaviors utilized mental treatment services. Bourdon et al. (2020) shared that Black individuals and Asian individuals were less likely to seek counseling and mental health services. These findings necessitate the need to investigate factors hindering the mental health help-seeking attitude or behavior of university undergraduate students.

Locally, Tanata et al.'s (2018) study analysis revealed that stigma was experienced under conditions where mental health care was not readily available, and people in the local community could not resolve the people with mental health problems. Likewise, Tanata et al. (2018) and Shim et al. (2022) suggested that exploring the experiences of stigma and its related factors can provide fundamental knowledge for an effective stigma reduction program in the Filipino setting (Martinez et al., 2020). These glaring research gaps buttress the importance of this research project.

Moreover, the study by Cureg-Estrada et al. (2023) disclosed that the prevalence of mental disorders ranged between 11.3% and 11.6%, with an average annual increase of 2.0%, increasing from 7.0 to 12.5 million Filipinos diagnosed with a mental disorder between 1990 and 2019 (Cureg-Estrada et al., 2023). Another study by Villani et al. (2021) revealed that the student cohort shows a prevalence of anxiety and depression almost twice as high as that observed in the general population, with 35.33% classified as anxious and 72.93% as depressed (Villani et al., 2021).

Serrano et al. (2023) explored the influence of sociodemographic characteristics, social support, and family history on depression, anxiety, and stress among young adult senior high school students. The study findings showed that three out of five participants have a significant risk for depression. However, four out of five participants were at risk of anxiety, and one out of four participants was at risk for stress (Serrano et al., 2023).

Likewise, the paper mentioned that being female and a family history of mental disorders may be risk factors for significant stress. Based on the findings, the authors suggested further research to understand mental health among Filipino students (Serrano et al., 2023).

Interestingly, the exploration of extant literature and empirical studies highlights several research gaps in terms of diverse population gaps (Vidourex et al., 2014), gender gaps (Ensenberg et al., 2012), and mental health implementation gaps (Shim et al., 2022). Also, intervention, treatment, and college students' training gaps (Vidourex et al., 2014; Shim et al., 2022), empirical gaps (Bourdon et al., 2020; Johnson et al., 2023), and knowledge gaps (Tanata et al., 2018; Martinez et al., 2020; Shim et al., 2022).

For example, Vidourek et al.'s (2014) study findings indicated that females perceived greater benefits to having participated in mental health services and held significantly lower stigma-related attitudes than males. Also, the findings indicated that students who had ever received mental health services reported significantly more barriers to treatment than did students who had never received services (Vidourex et al., 2014). These findings suggest that health professionals should target students with educational programs about positive outcomes related to receiving mental health services and work with treatment centers to reduce barriers to receiving services (Vidourex et al., 2014).

METHODOLOGY

A descriptive quantitative research design was used in this study. This helped in describing the pilot testing of the dissertation project instruments. Sixty (60) undergraduate students, composed of first-year, second-year, and third-year students from a state university in Cavite, Philippines. The participants were psychology program and the social work program, who voluntarily consented to answer survey questionnaires after obtaining approval from the college dean. The population frame for the study is public university undergraduate students.

Hence, based on the purposive sampling technique, pilot test guidelines, which seem informal but were supported empirically, were used in the voluntary selection of the sixty respondents through random selection (Serder et al., 2021; Wilson Vanvoorhis & Morgan, 2007). Besides, extant literature disclosed that in a pilot investigation, sample size calculation may not be required for the pilot sample (Jones et al., 2003). Therefore, another supporting sample size justification was based on the inclusion and exclusion criteria of the planned larger study, then testing the feasibility of the methods (Westlund & Stuart, 2017; Hertzog, 2008).

The sample selection was based on the kappa agreement test, intra-class correlation test, and Cronbach's alpha test, which recommended a minimum sample size requirement based on the ideal effect sizes of at least 15, 22, and 24 subjects, respectively (Bujang et al., 2024). Accordingly, this indicates that by making allowances for a non-response rate of 20.0%, a minimum sample size of 30 respondents will be sufficient to assess the reliability of the questionnaire. Therefore, the focus of the report is to share the outcomes of the pilot testing results of the scale reliability testing. The Cronbach's method and SPSS version 21.0 were utilized in the scale reliability analysis.

Research shows that there are three common statistical tests used to determine the reliability of questionnaires. These include the kappa agreement test, the intra-class correlation test, and Cronbach's alpha test (Bujang et al., 2024). Accordingly, the Cronbach's α (CA) method was used in data analysis to determine the internal consistency, which was the focus of the pilot testing of the scales. The value of Cronbach's alpha ranges from 0 to 1, with the higher values implying the items are measuring the same latent variable or dimension (Bujang et al., 2024). On the contrary, if Cronbach's alpha value is low (near 0), it means some or all the items are not measuring the same dimension, and so the questionnaire does not exhibit reliability or internal consistency (Cronbach, 1951; Bujang et al., 2023).

Nonetheless, Cronbach's α alone does not confirm construct validity and reliability because researchers can utilize the EFA/CFA or convergent validity. Accordingly, in the main study, the researcher will subject the questionnaires further to a reliability check through confirmatory factor analysis (CFA) to determine their construct validity.

For this study, the outcomes are above the threshold of .07 α (Cronbach, 1951). This indicates that the α findings are acceptable because they possess sufficient validity and internal coherence, showing the scales meet the criteria to measure the psychological and mental constructs examined in the study. Thus, the tables below indicate the pilot testing data analysis of the dissertation study instruments.

The compounded Social Stigma scale items were adapted from the Berger Stigma scale (Berger et al., 2001), and Vogt et al.'s (2014) Endorsed and Anticipated Stigma Inventory and measured on a 5-point Likert rating response format except for the coping strategies scale of 1 (*strongly disagree*), 2 (*somewhat disagree*), 3 (*neither agree nor disagree*), 4 (*somewhat agree*), and 5 (*strongly agree*) (Vogt et al., 2014). Mental Health in terms of depression (9 items), anxiety (14 items) will be assessed using the Depression Anxiety Stress Scale (DAS-21) (Lovibond et al., 1995), whereas the respondents stress (10 items) will be measured utilizing the Perceived Stress Scale (Cohen et al., 1983) each subscale items will be answered on a 4-point Likert scale ranging from 0 to 3.

The Mental Health Help-Seeking Attitude items will be adapted from the Mental Health Help-Seeking Intention Scale (MHSIS). The MHSIS was developed by Hammer and Vogel (2017), and the Attitude Toward Seeking Professional Psychological Help Scale (ATSPPHS) (Fischer & Farina, 1995). The MHSIS survey has three items measured on a seven-point Likert scale from 1 (extremely unlikely) to 7 (extremely likely), with possible total scores ranging from 3 to 21. However, the scale for this study will be named the Undergraduate Mental Health Help-Seeking Attitudes scale and assessed using a 5-point Likert rating ranging from 1=extremely unlikely to 5=extremely likely.

Coping Strategies were assessed using Carver et al.'s (1989) Coping Orientation to Experienced Problems (Brief COPE). The three-factor model (problem-focused, emotion-focused, and avoidance) was conceptualized in this study. Also, problem-focused (10 items), emotion-focused (12 items), and avoidant coping (11 items). Mental Health Awareness was assessed based on three concepts, including awareness, knowledge, and recognition. The knowledge and awareness items were adopted from Siddique et al.'s (2022) self-developed questionnaire, while recognition items are from the Attitudes Towards Seeking Professional Psychological

Help (Fischer & Turner, 1970; Lee et al., 2023). For this study, mental health awareness (10 items), knowledge (8 items), and recognition (10 items) were assessed on a five-point Likert scale with 1 = strongly disagree, 2 = disagree, 3 = neither agree nor disagree, 4 = agree, and 5 = strongly agree.

DISCUSSION

The section discusses only the Cronbach’s alpha reliability testing of the scales to be used in the dissertation as a requirement for the fulfillment of the Doctor of Philosophy program. The mean and standard deviation are scheduled to be reported separately to contain the volume of the article pagination.

Validation and Reliability

Indicators	Subscales	Cronbach Alpha	Overall, Alpha
Compounded Social Stigma	Personalized/Self-stigma	.799	
	Self-image Negative Stigma	.872	
	Public Attitudes to Stigma	.736	.905
Mental Health	Depression	.876	
	Anxiety	.927	
	Stress	.749	.947
Coping Strategies	Problem-focused	.872	
	Emotion-focused	.772	.861
	Avoidant Coping	.832	
Mental Health Awareness	Awareness	.894	.925
	Knowledge	.846	
	Recognition	.942	.838
Mental Health Help-seeking Attitudes		.838	

Table 1 displays the results of the internal consistency of the dissertation instruments' pilot testing data analysis in terms of personalized/self-stigma and public attitudes to stigma. As shown in the table, the Cronbach alpha results affirm that the instruments are valid and reliable. This further illustrates that the scales can measure the purported research conceptualized variables to be used in this study's data gathering.

Moreover, as indicated in Table 1, the Cronbach alpha values are .799 for personalized/self-stigma, .872 for Self-Image negative stigma, and .736 for public attitudes to stigma. These results confirm that the scales are credible and reliable for measuring the compounded social stigma experienced by undergraduate university students.

Besides, Table 1 illustrates that the pilot test outcomes established that the entire scale's internal consistency is reliable because they met the minimum value of Cronbach’s alpha coefficient of at least .60 (Bujang et al., 2018; Nunnally, 1967).

Compounded Social Stigma

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
CSS1	24.80	40.061	.588	.565	.771

CSS2	25.02	40.051	.530	.583	.776
CSS3	24.98	40.593	.506	.476	.778
CSS4	24.15	37.350	.627	.640	.762
CSS5	24.32	37.373	.592	.572	.766
CSS6	23.90	40.193	.366	.345	.795
CSS7	23.68	39.406	.468	.446	.782
CSS8	23.17	40.175	.438	.343	.785
CSS9	24.27	40.402	.346	.369	.798
CSS10	24.72	41.054	.348	.482	.796

Table 2 shows the item-total statistics of the Cronbach's alpha of the compounded social stigma in terms of the personalized/self-stigma construct, with a Cronbach's alpha of 0.799. This is measured with a ten-item scale as indicated in Appendix A. These findings indicate that the scale is reliable and possesses acceptable credibility to measure the personalized/self-stigma of university undergraduate students (Cronbach, 1951).

Table 3.
Compounded Social Stigma in terms of Self-image Negative Stigma Item-Total Statistics (a=.0872)

Items	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
SNS1	23.93	51.419	.433	.340	.872
SNS2	24.37	49.253	.559	.420	.862
SNS3	24.53	51.033	.559	.489	.862
SNS4	24.72	49.969	.576	.507	.860
SNS5	24.30	50.417	.639	.496	.856
SNS6	25.07	49.419	.573	.502	.861
SNS7	24.88	47.223	.785	.699	.844
SNS8	24.63	48.168	.653	.665	.854
SNS9	24.40	50.753	.532	.481	.864
SNS10	24.57	49.979	.630	.516	.856

Table 3 shows the item-total statistics of the Cronbach's alpha of the compounded social stigma in terms of the self-image negative stigma construct, with a Cronbach's alpha of 0.872. This is measured with a ten-item scale as indicated in Appendix A. These findings indicate that the scale is reliable and possesses good credibility to measure the self-image negative stigma of university undergraduate students (Cronbach, 1951).

Table 4.
Compounded Social Stigma in terms of Public Attitudes to Stigma Item-Total Statistics (a=0.736)

Items	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
PAS1	25.75	27.987	.321	.376	.728
PAS2	25.98	27.847	.414	.384	.712
PAS3	26.58	27.535	.445	.370	.708
PAS4	26.13	28.490	.327	.293	.726
PAS5	25.78	29.325	.226	.447	.742
PAS6	25.57	26.080	.617	.459	.682
PAS7	25.28	29.596	.256	.247	.735
PAS8	25.88	27.291	.431	.436	.709
PAS9	26.07	28.504	.365	.263	.720
PAS10	26.02	26.322	.628	.599	.682

Table 4 shows the item-total statistics of the Cronbach's alpha of the compounded social stigma in terms of the public attitudes to the stigma construct, with a Cronbach's alpha of 0.736. This is measured with a ten-item scale as indicated in Appendix B. These findings indicate that the scale is reliable and possesses acceptable

credibility to measure the self-stigma of university undergraduate students (Cronbach, 1951). Although the Cronbach’s alpha is above the threshold of .07 (Table 1), the highlighted items (item 6 and item 10) can be deleted to reduce the number of items. However, when viewed on an overall scale, the items correlated strongly. Also, according to Mohd (2005) as cited in Yee (2022), the value of reliability is high when it reaches a minimum of .60.

Table 5. Overall Compounded Social Stigma Item-Total Statistics (a=0.905)

Items	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
STIGMA1	80.85	286.028	.463	.789	.902
STIGMA2	81.07	285.453	.438	.736	.902
STIGMA3	81.03	283.965	.501	.722	.901
STIGMA4	80.20	277.010	.583	.832	.900
STIGMA5	80.37	275.626	.591	.802	.899
STIGMA6	79.95	285.404	.330	.619	.905
STIGMA7	79.73	280.301	.493	.667	.901
STIGMA8	79.22	282.173	.466	.684	.902
STIGMA9	80.32	283.847	.361	.635	.904
STIGMA10	80.77	283.436	.409	.763	.903
STIGMA11	79.72	280.139	.483	.660	.901
STIGMA12	80.15	278.774	.510	.602	.901
STIGMA13	80.32	279.135	.604	.747	.900
STIGMA14	80.50	278.085	.582	.748	.900
STIGMA15	80.08	280.484	.594	.747	.900
STIGMA16	80.85	274.503	.641	.814	.898
STIGMA17	80.67	273.684	.717	.794	.897
STIGMA18	80.42	273.874	.656	.789	.898
STIGMA19	80.18	279.237	.558	.740	.900
STIGMA20	80.35	279.825	.579	.744	.900
STIGMA21	80.02	295.237	.119	.651	.908
STIGMA22	80.25	292.462	.225	.589	.906
STIGMA23	80.85	287.384	.372	.609	.903
STIGMA24	80.40	282.617	.486	.701	.901
STIGMA25	80.05	279.303	.544	.647	.900
STIGMA26	79.83	285.056	.453	.674	.902
STIGMA27	79.55	288.319	.353	.670	.904
STIGMA28	80.15	294.197	.162	.634	.907
STIGMA29	80.33	288.599	.347	.508	.904
STIGMA30	80.28	286.783	.424	.784	.902

Table 5 shows the overall item-total statistics of Cronbach’s alpha of the compounded social stigma constructs, with a Cronbach’s alpha of 0.905. This is measured with a thirty-item scale. The highlighted items (item 6 and item 10) in Table 4 lapses have been closed by the overall assessment. This indicates that the higher the number of items, the greater the power (internal consistency) of scale reliability. Hence, these findings signify that the scale is reliable and possesses acceptable credibility to measure the compounded social stigma of university undergraduate students (Cronbach, 1951).

Mental Health Scales

Table 6. Mental Health in terms of Depression Symptoms Item-Total Statistics

Items	Scale	Scale	Corrected Item-	Squared Multiple	Cronbach's Alpha if Item
-------	-------	-------	-----------------	------------------	--------------------------

	Mean if Item Deleted	Variance if Item Deleted	Total Correlation	Correlation	Deleted
MHAD1	12.03	43.219	.632	.451	.862
MHSD2	12.20	42.739	.693	.668	.858
MHSD3	11.95	40.082	.700	.609	.855
MHSD4	11.62	45.257	.462	.344	.873
MHSD5	11.98	40.593	.693	.578	.856
MHSD6	12.02	42.220	.580	.471	.865
MHSD7	12.23	42.521	.573	.422	.866
MHSD8	12.78	44.613	.516	.407	.870
MHSD9	12.27	41.216	.616	.546	.863
MHSD10	12.42	44.417	.530	.551	.869

Table 6 shows the overall item-total statistics of Cronbach’s alpha of mental health in terms of depression or depressive symptoms constructs, with a Cronbach’s alpha of 0.876. This is measured with a ten-item scale as indicated in Appendix C. Hence, these findings signify that the scale is reliable and possesses good credibility to measure the mental health of university undergraduate students (Cronbach, 1951).

Table 7.
Mental Health in terms of Anxiety Item-Total Statistics

Items	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
MHSA1	17.88	95.190	.800	.751	.918
MHSA2	17.78	94.444	.802	.804	.917
MHSA3	17.47	97.168	.685	.724	.921
MHSA4	18.03	94.846	.768	.748	.918
MHSA5	18.32	97.779	.646	.705	.922
MHSA6	17.70	98.383	.613	.492	.923
MHSA7	17.65	96.570	.669	.610	.922
MHSA8	18.07	98.334	.484	.443	.929
MHSA9	18.40	98.854	.538	.575	.926
MHSA10	18.30	98.247	.582	.567	.924
MHSA11	17.98	94.491	.756	.669	.919
MHSA12	18.23	95.843	.688	.762	.921
MHSA13	18.27	99.555	.549	.537	.925
MHSA14	18.12	93.800	.745	.625	.919

Table 7 shows the overall item-total statistics of Cronbach’s alpha of mental health in terms of the anxiety construct, with a Cronbach’s alpha of 0.927. This is measured with a fourteen-item scale as indicated in Appendix D. Hence, these findings mean that the scale is reliable and possesses a good and acceptable credibility to measure the anxiety component of the mental health of university undergraduate students (Cronbach, 1951).

Table 8.
Mental Health in terms of Perceived Stress Item-Total Statistics

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
MHPS1	12.97	20.541	.417	.568	.728
MHPS2	12.92	18.993	.483	.488	.717
MHPS3	12.72	18.681	.539	.507	.707

MHPS4	13.28	20.206	.403	.428	.729
MHPS5	13.42	21.501	.287	.396	.744
MHPS6	13.13	19.236	.573	.503	.705
MHPS7	13.18	21.847	.186	.361	.759
MHPS8	13.55	20.930	.259	.432	.751
MHPS9	13.08	19.569	.505	.443	.715
MHPS10	13.00	19.254	.466	.455	.719

Table 8 shows the overall item-total statistics of Cronbach’s alpha of mental health in terms of the perceived stress construct, with a Cronbach's alpha of 0.749. This is measured with a ten-item scale as indicated in Appendix E. Hence, these findings mean that the scale is reliable and possesses acceptable credibility to measure the mental health of university undergraduate students (Cronbach, 1951).

Overall mental health item-total reliability statistics in terms of depression, anxiety, and perceived stress

Table 9.
Overall Mental Health Item-Total Statistics

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
MENTALH1	46.02	399.678	.600	.	.945
MENTALH2	46.18	399.203	.628	.	.945
MENTALH3	45.93	388.504	.715	.	.944
MENTALH4	45.60	402.685	.523	.	.945
MENTALH5	45.97	390.033	.709	.	.944
MENTALH6	46.00	395.627	.589	.	.945
MENTALH7	46.22	399.800	.505	.	.946
MENTALH8	46.77	404.080	.485	.	.946
MENTALH9	46.25	393.547	.604	.	.945
MENTALH10	46.40	400.278	.586	.	.945
MENTALH11	45.97	391.151	.802	.	.943
MENTALH12	45.87	390.762	.776	.	.943
MENTALH13	45.55	393.811	.726	.	.944
MENTALH14	46.12	392.105	.731	.	.944
MENTALH15	46.40	398.041	.610	.	.945
MENTALH16	45.78	397.461	.625	.	.945
MENTALH17	45.73	392.640	.709	.	.944
MENTALH18	46.15	397.655	.498	.	.946
MENTALH19	46.48	400.152	.512	.	.946
MENTALH20	46.38	399.732	.534	.	.945
MENTALH21	46.07	391.453	.719	.	.944
MENTALH22	46.32	393.779	.664	.	.944
MENTALH23	46.35	400.062	.556	.	.945
MENTALH24	46.20	388.773	.742	.	.943
MENTALH25	45.87	400.863	.696	.	.944
MENTALH26	45.82	398.356	.609	.	.945
MENTALH27	45.62	397.868	.637	.	.944
MENTALH28	46.18	417.576	.140	.	.948
MENTALH29	46.32	419.034	.118	.	.948
MENTALH30	46.03	406.948	.467	.	.946
MENTALH31	46.08	417.298	.148	.	.948
MENTALH32	46.45	415.608	.174	.	.948
MENTALH33	45.98	407.576	.435	.	.946
MENTALH34	45.90	398.024	.635	.	.945

Table 9 shows the overall item-total statistics of Cronbach’s alpha of mental health in terms of the depression, anxiety, and stress constructs, with a Cronbach’s alpha of 0.947. This is measured with a 34-item scale as indicated in Appendix C. Therefore, these findings mean that the scale is reliable and possesses acceptable credibility to measure the mental health of university undergraduate students (Cronbach, 1951).

Coping strategies scale in terms of problem-focused, emotion-focused, and avoidant coping strategies

Table 10.
Coping Strategies in terms of Problem-focused Item-Total Statistics

Items	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
CSPF1	26.17	34.853	.483	.496	.868
CSPF2	25.85	34.265	.560	.515	.862
CSPF3	26.13	31.338	.671	.699	.853
CSPF4	25.88	33.156	.667	.662	.854
CSPF5	25.92	32.451	.695	.535	.852
CSPF6	25.80	32.264	.679	.573	.852
CSPF7	26.13	33.067	.535	.545	.865
CSPF8	25.85	34.096	.518	.387	.865
CSPF9	25.45	35.031	.461	.391	.869
CSPF10	25.72	32.647	.648	.597	.855

Table 10 shows the item-total statistics of Cronbach’s alpha of coping strategies in terms of the problem-focused coping strategies construct, with a Cronbach’s alpha of 0.872. This is measured with a fourteen-item scale as indicated in Appendix F. Hence, these findings mean that the scale is reliable and possesses acceptable credibility to measure the coping strategies of university undergraduate students (Cronbach, 1951).

Table 11.
Coping Strategies in terms of Emotion-focused Strategies Item-Total Statistics

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
CSEF1	31.02	37.915	.377	.642	.760
CSEF2	30.98	37.373	.509	.432	.747
CSEF3	30.83	38.311	.362	.566	.762
CSEF4	31.02	37.983	.457	.608	.752
CSEF5	30.72	38.918	.342	.490	.763
CSEF6	30.60	36.854	.612	.465	.738
CSEF7	31.03	35.524	.616	.474	.733
CSEF8	31.48	40.152	.178	.678	.784
CSEF9	30.88	36.884	.586	.460	.740
CSEF10	31.00	37.525	.410	.606	.756
CSEF11	31.30	39.502	.234	.567	.777
CSEF12	30.93	37.589	.376	.429	.761

Table 11 shows the item-total statistics of Cronbach’s alpha of coping strategies in terms of the emotion-focused coping strategies construct, with a Cronbach’s alpha of 0.772. This is measured with a 12-item scale as indicated in Appendix F. Hence, these findings mean that the scale is reliable and possesses acceptable credibility to measure the coping strategies of university undergraduate students (Cronbach, 1951).

Table 12.
Coping Strategies in terms of Avoidant Coping Strategies Item-Total Statistics

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
CSA1	19.78	36.986	.085	.411	.858
CSA2	20.60	33.125	.473	.626	.821
CSA3	20.98	32.661	.568	.849	.813
CSA4	20.52	30.356	.673	.659	.802
CSA5	20.67	31.175	.694	.666	.801
CSA6	21.07	34.572	.450	.845	.823
CSA7	20.78	30.952	.698	.772	.801
CSA8	19.48	34.762	.340	.629	.832
CSA9	20.72	32.444	.574	.642	.812
CSA10	20.72	32.681	.597	.797	.811
CSA11	20.02	32.966	.506	.576	.818

Table 12 shows the item-total statistics of Cronbach’s alpha of coping strategies in terms of the avoidant coping strategies construct, with a Cronbach’s alpha of 0.832. This is measured with an 11-item scale as indicated in Appendix G. Hence, these findings mean that the scale is reliable and possesses acceptable credibility to measure the coping strategies of university undergraduate students (Cronbach, 1951).

Table 13.
Overall Coping Strategies Item-Total Statistics

Items	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
CSS1	82.53	177.033	.446	.	.855
CSS2	82.22	175.969	.505	.	.854
CSS3	82.47	172.728	.534	.	.853
CSS4	82.25	176.903	.453	.	.855
CSS5	82.28	175.495	.483	.	.854
CSS6	82.17	173.734	.533	.	.853
CSS7	82.50	178.966	.288	.	.859
CSS8	82.22	176.817	.423	.	.856
CSS9	81.82	180.220	.303	.	.859
CSS10	82.08	174.586	.504	.	.854
CSS11	82.35	172.672	.496	.	.854
CSS12	82.32	175.779	.454	.	.855
CSS13	82.17	179.836	.251	.	.860
CSS14	82.35	173.011	.573	.	.852
CSS15	82.05	179.540	.283	.	.859
CSS16	81.93	173.623	.591	.	.852
CSS17	82.37	173.423	.501	.	.854
CSS18	82.82	176.423	.331	.	.858
CSS19	82.22	175.088	.507	.	.854
CSS20	82.33	175.955	.380	.	.857
CSS21	82.63	178.067	.286	.	.860
CSS22	82.27	176.368	.343	.	.858
CSS23	82.38	177.698	.325	.	.858
CSS24	83.20	182.027	.200	.	.861
CSS25	83.58	182.722	.190	.	.861
CSS26	83.12	175.901	.398	.	.856

CSS27	83.27	181.012	.248	.	.860
CSS28	83.67	185.345	.102	.	.862
CSS29	83.38	181.257	.232	.	.860
CSS30	82.08	177.874	.387	.	.857
CSS31	83.32	181.745	.224	.	.860
CSS32	83.32	183.542	.165	.	.862
CSS33	82.62	180.308	.277	.	.859

Table 13 shows the overall item-total statistics of Cronbach’s alpha of coping strategies in terms of the coping strategies construct (problem-focused, emotion-focused, and avoidant coping strategies), with a Cronbach’s alpha of 0.861. This is measured with a 33-item scale. Accordingly, these findings illustrate that the scale is reliable and possesses acceptable credibility and dependability to measure the coping strategies of university undergraduate students (Cronbach, 1951).

Mental Health Awareness Scales in terms of awareness, knowledge, and recognition

Table 14.
Mental Health in terms of Awareness Item-Total Statistics

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
MA1	36.18	48.423	.326	.267	.905
MA2	35.95	47.981	.436	.367	.896
MA3	35.92	46.112	.466	.427	.896
MA4	35.57	42.148	.800	.736	.871
MA5	35.45	43.065	.807	.802	.872
MA6	35.63	43.185	.749	.714	.875
MA7	35.17	43.599	.778	.807	.874
MA8	35.45	42.964	.799	.729	.872
MA9	35.18	44.525	.828	.830	.873
MA10	35.15	46.536	.491	.402	.893

Table 14 shows the item-total statistics of Cronbach’s alpha of mental awareness in terms of the awareness construct, with a Cronbach’s alpha of 0.894. This is measured with a 10-item scale as indicated in Appendix H. Hence, these findings mean that the scale is reliable and possesses acceptable credibility to mental health awareness of university undergraduate students (Cronbach, 1951).

Table 15
Mental Health Awareness in terms of Knowledge Item-Total Statistics

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
MAK1	27.87	26.050	.382	.382	.852
MAK2	27.30	22.180	.843	.811	.795
MAK3	27.33	23.141	.751	.685	.808
MAK4	27.50	24.525	.522	.460	.836
MAK5	28.33	25.141	.445	.261	.846
MAK6	27.43	23.979	.584	.425	.828
MAK7	27.47	24.084	.596	.521	.826
MAK8	27.27	24.945	.576	.520	.829

Table 15 shows the item-total statistics of Cronbach’s alpha of mental health awareness in terms of the knowledge construct, with a Cronbach’s alpha of 0.846. This is measured with an 8-item scale as indicated in Appendix H. The items indicate lapses in their internal consistency, but they met the minimum Cronbach’s

alpha above .60 recommended by past studies (Bujang et al., 2018; Nunnally, 1967). However, given the Cronbach alpha of .846, the knowledge subscale meets an adequate threshold for the scale to be used in this study.

Besides, according to Mohd (2005) as cited in Yee (2022), the value of reliability is high when it reaches a minimum of 0.60. Therefore, these findings signify that the scale is reliable and possesses acceptable credibility to measure the mental health awareness of university undergraduate students (Cronbach, 1951). However, the scale items will be reviewed and modified to improve the internal consistency in the main study's confirmatory factor analysis.

Table 16.
Mental Health in terms of Recognition Item-Total Statistics

	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
MAR1	33.58	56.891	.698	.547	.939
MAR2	33.57	56.928	.746	.621	.937
MAR3	33.45	53.065	.832	.714	.933
MAR4	33.42	55.264	.781	.660	.935
MAR5	33.30	55.976	.744	.626	.937
MAR6	33.65	55.825	.731	.597	.938
MAR7	33.33	55.006	.806	.694	.934
MAR8	33.67	55.718	.711	.578	.939
MAR9	33.17	55.599	.794	.722	.935
MAR10	33.22	53.732	.792	.717	.935

Table 16 shows the item-total statistics of Cronbach's alpha of mental health awareness in terms of the recognition construct, with a Cronbach's alpha of 0.942. This is measured with a 10-item scale as indicated in Appendix I. Hence, these findings mean that the scale is reliable and possesses acceptable credibility to measure the mental health awareness of university undergraduate students (Cronbach, 1951).

Table 17.
Overall Mental Awareness Item-Total Statistics

Items	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
MHA1	109.08	291.061	.255	.517	.926
MHA2	108.85	289.486	.354	.567	.924
MHA3	108.82	287.712	.332	.634	.925
MHA4	108.47	277.643	.634	.858	.921
MHA5	108.35	278.909	.657	.908	.920
MHA6	108.53	278.558	.632	.810	.921
MHA7	108.07	277.453	.716	.913	.920
MHA8	108.35	276.469	.720	.852	.920
MHA9	108.08	278.383	.800	.928	.919
MHA10	108.05	281.811	.538	.707	.922
MHA11	108.78	285.969	.441	.578	.923
MHA12	108.22	273.901	.830	.912	.918
MHA13	108.25	279.547	.671	.842	.920
MHA14	108.42	282.078	.539	.701	.922
MHA15	109.25	291.275	.266	.670	.926
MHA16	108.35	279.147	.627	.800	.921

MHA17	108.38	278.817	.659	.725	.920
MHA18	108.18	285.983	.495	.743	.923
MHA19	108.85	279.621	.666	.730	.920
MHA20	108.83	281.904	.633	.754	.921
MHA21	108.72	276.478	.649	.832	.920
MHA22	108.68	280.966	.594	.834	.921
MHA23	108.57	279.606	.648	.739	.921
MHA24	108.92	279.705	.625	.743	.921
MHA25	108.60	276.380	.741	.883	.919
MHA26	108.93	280.741	.573	.663	.921
MHA27	108.43	278.690	.695	.827	.920
MHA28	108.48	279.305	.574	.850	.921

Table 17 shows the overall item-total statistics of Cronbach’s alpha of mental health awareness constructs as measured with a 28-item scale, with an overall Cronbach’s alpha of 0.925. Hence, these findings mean that the scale is reliable and possesses acceptable credibility to measure the mental health awareness of university undergraduate students (Cronbach, 1951). Recalling the item-total Cronbach alpha of the knowledge subscales here, it indicates a very strong Cronbach’s alpha of .918-.935 (items 11-20).

Mental Health Help-seeking Attitude

Table 18.
Mental Health Help-seeking Attitude Item-Total Statistics

Items	Scale Mean if Item Deleted	Scale Variance if Item Deleted	Corrected Item-Total Correlation	Squared Multiple Correlation	Cronbach's Alpha if Item Deleted
MHHA1	34.78	55.766	.500	.598	.826
MHHA2	34.38	54.512	.594	.657	.820
MHHA3	34.47	55.982	.579	.603	.822
MHHA4	34.67	54.362	.592	.609	.820
MHHA5	34.63	54.236	.621	.486	.818
MHHA6	36.00	57.220	.313	.322	.843
MHHA7	35.05	53.879	.519	.440	.825
MHHA8	34.68	56.118	.475	.570	.828
MHHA9	34.82	55.881	.507	.548	.826
MHHA10	35.47	57.880	.258	.299	.848
MHHA11	34.93	54.504	.555	.456	.822
MHHA12	34.48	53.474	.626	.550	.817

Table 18 shows the item-total statistics of Cronbach’s alpha of the mental health help-seeking attitude construct, with a Cronbach’s alpha of 0.838. This is measured with a 12-item scale as indicated in Appendix J. Hence, these findings mean that the scale is reliable and possesses acceptable credibility and dependability to measure the mental health help-seeking attitude of university undergraduate students (Cronbach, 1951).

CONCLUSION

Inferring from the pilot testing correlation coefficient data analysis, the results affirm that the scales are credible for application in this dissertation. Furthermore, the outcomes validate that the use of Cronbach's alpha (CA) ensures data reliability, informs sound decision-making, and enhances the overall effectiveness of research in this vital field of psychology and mental health (Izal et al., 2024). Therefore, its adoption and application in tools commonly employed for assessing psychological and human health risks related to social stigma and mental health are deemed necessary for ensuring the robustness of the assessment process (Izah et al., 2024).

RECOMMENDATIONS

The study has investigated the dissertation's conceptualized constructs to determine their internal consistency after seven experts performed face or content validation of the instruments. The findings illustrate that Cronbach's alpha (CA) can play a crucial role in ensuring the validity, reliability, and internal consistency of scales that measure what they are purported to measure. Hence, based on the findings, the researcher suggested that future scholars can utilize the scales (Appendix A) in their research projects to extend the study outcomes' credibility and dependability.

REFERENCES

1. Bantjes, J., Saal, W., Lochner, C., Roos, J., Auerbach, R. P., Mortier, P., Bruffaerts, R., Kessler, R. C., & Stein, D. J. (2020). Inequality and mental healthcare utilization among first-year university students in South Africa. *International Journal of Mental Health Systems*, 14(1), 5–5. <https://doi.org/10.1186/s13033-020-0339-y>.
2. Bujang, M. A., Omar, E. D., Foo, D. H. P., & Hon, Y. K. (2024). Sample size determination for conducting a pilot study to assess the reliability of a questionnaire. *Restorative dentistry & endodontics*, 49(1), e3. <https://doi.org/10.5395/rde.2024.49.e3>.
3. Bujang, M. A., Lai, W. H., Ratnasingam, S., Tiong, X. T., Hon, Y. K., Yap, E. P. P., Jee, Y. Y. H., Ahmad, N. F. D., Kim, A. R. J., Husin, M., & Haniff, J. (2023). Development of a Quality-of-Life Instrument to Measure Current Health Outcomes: Health-Related Quality of Life with Six Domains (HRQ-6D). *Journal of Clinical Medicine*, 12(8), 2816. <https://doi.org/10.3390/jcm12082816>.
4. Bujang, M. A., Omar, E. D., & Baharum, N. A. (2018). A Review on Sample Size Determination for Cronbach's Alpha Test: A Simple Guide for Researchers. *The Malaysian journal of medical sciences: MJMS*, 25(6), 85–99. <https://doi.org/10.21315/mjms2018.25.6.9>.
5. Carver, C. S., Scheier, M. F., & Weintraub, J. K. (1989). Assessing coping strategies: A theoretically based approach. *Journal of personality and social psychology*, 56(2), 267.
6. Cohen S, Williamson G.. Perceived stress in a probability sample of the United States. In: Spacapan S, Oskamp S, eds. *The Social Psychology of Health: Claremont Symposium on Applied Social Psychology*. Newbury Park, CA: Sage;1988:31–67.
7. Cronbach, L. J. (1951). Coefficient alpha and the internal structure of tests. *Psychometrika*, 16(3), 297–334. Doi:10.1007/bf02310555.
8. Cureg-Estrada, E. F., Sawali, R. R., & Aquino, M. P. (2023). Underscoring the Mental Health Agenda in the Philippines. https://cpbrd.congress.gov.ph/images/PDF%20Attachments/CPBRD%20Policy%20Brief/PB2023-02_Underscoring_the_Mental_Health_Agenda_in_the_Phippines.pdf.
9. Eisenberg, D., Hunt, J., & Speer, N. (2012). Help-seeking for mental health on college campuses: review of evidence and next steps for research and practice. *Harvard review of psychiatry*, 20(4), 222–232. <https://doi.org/10.3109/10673229.2012.712839>.
10. Fischer EH, & Farina A (1995). Attitudes toward seeking professional psychological help: A shortened form and considerations for research. *Journal of College Student Development*, 36, 368–373.
11. Fischer, E. H., & Turner, J. L. (1970). Orientations to seeking professional help: development and research utility of an attitude scale. *Journal of consulting and clinical psychology*, 35(1), 79–90. <https://doi.org/10.1037/h0029636>.
12. Hammer JH, & Vogel DL (2017). Development of the Help-Seeker Stereotype Scale. *Stigma and Health*, 2, 121–136. <https://doi.org/10.1037/sah0000048>.
13. Hertzog M. A. (2008). Considerations in determining sample size for pilot studies. *Research in nursing & health*, 31(2), 180–191. <https://doi.org/10.1002/nur.20247>.
14. Izah, S. C., Sylva, L. Hait, M. (2024). Cronbach's Alpha: A Cornerstone in Ensuring Reliability and Validity in Environmental Health Assessment. *ES Energy & Environment* 23, 1057. <https://dx.doi.org/10.30919/esee1057>.
15. Izah, S. C., Richard, G., Stanley, H. O., Ogwu, M. C., Sawyer, W. E., & Uwaeme, O. R. (2023). Prospects and application of multivariate and reliability analyses to one health risk assessments of toxic elements, *Toxicology and Environmental*.
16. Jones, S. R., Carley, S., & Harrison, M. (2003). An introduction to power and sample size estimation. *Emergency medicine journal: EMJ*, 20(5), 453–458. <https://doi.org/10.1136/emj.20.5.453>.

17. Lee, J. A., Goh, M. L., & Yeo, S. F. (2023). Mental health awareness of secondary school students: Mediating roles of knowledge on mental health, knowledge on professional help, and attitude towards mental health. *Heliyon*, Volume 9, Issue 3, e14512, <https://doi.org/10.1016/j.heliyon.2023.e14512>.
18. Martinez, A. B., Co, M., Lau, J., & Brown, J. S. L. (2020). Filipino help-seeking for mental health problems and associated barriers and facilitators: a systematic review. *Social psychiatry and psychiatric epidemiology*, 55(11), 1397–1413. <https://doi.org/10.1007/s00127-020-01937-2>.
19. Serdar, C. C., Cihan, M., Yücel, D., & Serdar, M. A. (2021). Sample size, power and effect size revisited: simplified and practical approaches in pre-clinical, clinical and laboratory studies. *Biochemia medica*, 31(1), 010502. <https://doi.org/10.11613/BM.2021.010502>.
20. Serrano, I. M. A., Cuyugan, A. M. N., Cruz, K., Mahusay, J. M. A., & Alibudbud, R. (2023). Sociodemographic characteristics, social support, and family history as factors of depression, anxiety, and stress among young adult senior high school students in Metro Manila, Philippines, during the COVID-19 pandemic. *Frontiers in Psychiatry*, 14, 1225035. <https://doi.org/10.3389/fpsy.2023.1225035>.
21. Shim, Y. R., Eaker, R., & Park, J. (2022). Mental Health Education, Awareness, and Stigma Regarding Mental Illness Among College Students. *Journal of Mental Health & Clinical Psychology*.
22. Siddique, A., Khan, M. A., & Khan, Z. (2022). The Effect of Credit Risk Management and Bank-Specific Factors on the Financial Performance of the South Asian Commercial Banks. *Asian Journal of Accounting Research*, 7, 182-194. <https://doi.org/10.1108/ajar-08-2020-0071>.
23. Westlund, E., & Stuart, E. A. (2017). The nonuse, misuse, and proper use of pilot studies in experimental evaluation research. *Am J Eval*. 38(2):246–61. Doi:10.1177/1098214016651489.
24. Tanaka, C., Tuliao, M. T. R., Tanaka, E., Yamashita, T., & Matsuo, H. (2018). A qualitative study on the stigma experienced by people with mental health problems and epilepsy in the Philippines. *BMC psychiatry*, 18(1), 325. <https://doi.org/10.1186/s12888-018-1902-9>.
25. Vidourek, R. A., King, K. A., Nabors, L. A., & Merianos, A. L. (2014). Students' benefits and barriers to mental health help-seeking. *Health psychology and behavioral medicine*, 2(1), 1009–1022. <https://doi.org/10.1080/21642850.2014.963586>.
26. Villani, L., Pastorino, R., Molinari, E., Anelli, F., Ricciardi, W., Graffigna, G., et al. (2021). Impact of the COVID-19 pandemic on psychological well-being of students in an Italian university: a web-based cross-sectional survey. *Global Health* 17, 1–14. Doi: 10.1186/s12992-021-00680-w.
27. Wilson Vanvoorhis, C. R., & Morgan, B. L. (2007). Understanding power and rules of thumb for determining sample sizes. *Tutor Quant Methods Psychol*. 3(2):43–50.
28. Yee, W.K., Kee, P., & Radzi, N.M.M. (2022). Validity and reliability in psychological well-being, job satisfaction, and student-teacher relationships among preschool teachers. *Academy of Strategic Management Journal*, 21(S2), 1-5.

Appendix A

Research Instruments

Part 1: Compounded Social Stigma Scale

Instructions: Below are statements that ask about some of the social and emotional aspects of stigma. For all the questions, just check (√) the numbers that go with your answer. **There are no right or wrong answers.** Feel free to write in comments as you go through the questions.

This first set of questions asks about some of your experiences, feelings, and opinions as to how people with stigma feel and how they are treated. Please do your best to answer each question below.

1	2	3	4	5		
Strongly Disagree	Disagree	Neither agree nor disagree	Agree	Strongly Agree		
Compounded Social Stigma Scale						
Nos.	Personalized/Self-stigma Items	1	2	3	4	5
1	People I care about stopped calling after learning I have a mental health illness					

2	I have lost friends by telling them I have mental health problems					
3	Some people will avoid touching me if they know I have a mental illness					
4	I have stopped socializing with some people due to their reaction to my having a health problem					
5	I have been hurt by how people reacted to learning I have a sickness.					
6	If I have a mental health problem, I will do anything to keep it a secret.					
7	Telling someone I have a mental health illness is risky					
8	I will be careful who I tell about that I have mental health problems					
9	I would feel a failure if I became mentally ill or unwell.					
10	If I had a mental health illness, I would feel ashamed of myself.					
Self-image Negative Stigma						
1	I feel guilty because I have emotional worries					
2	I feel I'm not as good a person as others because I have mental health problems					
3	People's attitudes about mental health make me feel worse about myself					
4	I have been hurt by how people reacted to learning I have a mental illness					
5	I do not reveal my mental health conditions to anybody to avoid being judged					
6	I would be ashamed if people knew that someone in my family had been diagnosed with a mental illness					
7	Experiencing mental health stigma makes me feel helpless at my university					
8	The experience of social stigma at my university weakens my self-confidence					
9	Experiencing social stigma contributes to isolating myself from social interactions					
10	The experience of social stigma and fear of being judged makes me not seek mental health help at my university					

Appendix B: Part 1: Compounded Social Stigma Scale Continues

Instructions: This study asks about some of the social and emotional aspects of having stigma. For most of the questions, just check (√) the numbers that go with your answer. There are no right or wrong answers. Feel free to write in comments as you go through the questions.

This first set of questions asks about some of your experiences, feelings, and opinions as to how people with stigma feel and how they are treated. Please do your best to answer each question.

1	2	3	4	5							
Strongly Disagree	Disagree	Neither agree nor disagree	Agree	Strongly Agree							
Public Attitudes to Stigma Items											
			1	2	3	4	5				
1	I think 80% of people in society believe a person who has skin rashes is dirty										
2	I think 80% of people in the university social environment										

	are uncomfortable around someone with mental health problems.					
3	People with mental issues are treated like outcasts in my university.					
4	People’s attitudes about mental illness make me feel worse about myself					
5	Since learning, I have had learning difficulties, and I worry about people discriminating against me.					
6	I think 80% of people would be afraid to have a conversation with a mentally ill person.					
7	I think 80% of students would have no problems with having a mental health illness as a friend at my university					
8	I think 80% of people do not accept the opinions of a person with a known mental health illness.					
9	I think 80% of people in this university think less about a student who was in a psychiatric center.					
10	I think 80% of people do not associate students with a mental health illness record.					

Appendix C: Part 2: Mental Health Scale (Depression, Anxiety, and Stress)

Instructions: This questionnaire aims to evaluate how you feel concerning your mental health status as a person. Please indicate how much you agree or disagree with each statement. Please respond spontaneously, without taking too much time over each item. Some phrases may seem strange to you, perhaps even shocking or repetitive. Do not worry. If certain statements do not apply to you at all, they will apply to other people. There are **no good or bad responses**; give the answer that best describes your feelings using the rating scale below.

0	1	2	3
Not at all	Several days	More than half the days	Nearly every day
Nos.	Over the last 2 weeks, how often have you been bothered by any of the following problems?		
1	Little interest or pleasure in doing things		
2	Feeling down, depressed, or hopeless		
3	Having trouble falling asleep or sleeping too much		
4	Feeling tired or having little energy		
5	Poor appetite or overeating		
6	I experience feeling bad about myself because I have let my family down		
7	Having trouble concentrating on reading textbooks or watching television		
8	Speaking so slowly that other people could have noticed?		
9	Thoughts that you would be better off not alive or hurting yourself in some way		
10	Being so fidgety or restless that you have been moving around a		

lot more than usual				

Appendix D: Part 2. Mental Health Scales Continues

Please read each statement and circle a number 0, 1, 2, or 3 which indicates how much the statement applied to you over the past week. There are no right or wrong answers. Do not spend too much time on any statement. The rating scale is as follows:

0	1	2	3		
Did not apply to me at all	Applied to me to some degree	Applied to me to a considerable degree	Applied to me very much		
2 B: Anxiety					
Nos.	Over the last 2 weeks, how often have you been bothered by any of the following problems?	0	1	2	3
1	Feeling nervous, anxious, or on edge				
2	Not being able to stop or control worrying				
3	Worrying too much about different things				
4	Trouble relaxing				
5	Being so restless that it's hard to sit still				
6	Becoming easily annoyed or irritable				
7	Feeling afraid as if something awful might happen				
8	I was aware of the dryness of my mouth				
9	I experienced breathing difficulty (e.g., excessively rapid breathing, breathlessness in the absence of physical exertion)				
10	I experienced trembling (e.g., in my hands)				
11	I was worried about situations in which I might panic and make a fool of myself				
12	I felt I was close to panic				
13	I was aware of the action of my heart in the absence of physical exertion (e.g., sense of heart rate increase, heart missing a beat)				
14	I felt scared for no good reason				

Appendix E: Part 2: Perceived Stress Scale Continues:

Instructions: This questionnaire aims to evaluate how you feel concerning your mental health status as a person. Please indicate how much you agree or disagree with each statement. Please respond spontaneously, without taking too much time over each item. Some phrases may seem strange to you, perhaps even shocking or repetitive. Do not worry. If certain statements do not apply to you at all, they will apply to other people. There are **no good or bad responses**; give the answer that best describes your feelings using the rating scale below.

0	1	2	3		
Not at all	Several days	More than half the days	Nearly every day		
Nos.	Over the last month, how often have you been bothered by any of the following problems?	0	1	2	3
1	In the last month, how often have you been upset because of something that happened unexpectedly?				
2	In the last month, how often have you felt that you were unable to control the important things in your life?				
3	In the last month, how often have you felt nervous and stressed?				
4	In the last month, how often have you felt confident about your ability to handle your problems?				
5	In the last month, how often have you felt that things were going				

	your way?				
6	In the last month, how often have you found that you could not cope with all the things that you had to do?				
7	In the last month, how often have you been able to control irritations in your life?				
8	In the last month, how often have you felt that you were on top of things?				
9	In the last month, how often have you been angered because of things that happened that were outside of your control?				
10	In the last month, how often have you felt difficulties piled up so high that you could not overcome them?				

Appendix F: Part 3: Coping Strategies Scale

Instructions: Each item says something about a particular way of coping. I want to know to what extent you've been doing what the item says. How much or how frequently? Don't answer based on whether it seems to be working or not- just whether or not you're doing it. Use these response choices. Try to rate each item separately in your mind from the others. Make your answers as true FOR YOU as you can.

1	2	3	4
I haven't been doing this at all	I've been doing this a little bit	I've been doing this for a medium amount	I have been doing this a lot
Coping Strategies			
Nos.	Problem-focused Coping Strategies Items	1	2
1	I have been concentrating my efforts on doing something about the situation I'm in		
2	I've been taking action to try to make the situation better		
3	I've been getting help and advice from other people.		
4	I've been trying to see it in a different light, to make it seem more positive.		
5	I've been trying to come up with a strategy about what to do.		
6	I've been looking for something good in what is happening.		
7	I've been trying to get advice or help from other people about what to do.		
8	I've been thinking hard about what steps to take.		
9	I learn something from the experience		
10	I do what has to be done, one step at a time.		
Emotion-focused Coping Strategies			
1	I've been getting emotional support from others.		
2	I've been saying things to let my unpleasant feelings escape.		
3	I've been criticizing myself.		
4	I've been getting comfort and understanding from someone.		
5	I've been making jokes about it.		
6	I've been accepting the reality of the fact that it has happened		
7	I've been expressing my negative feelings.		
8	I've been trying to find comfort in my religion or spiritual beliefs.		
9	I've been learning to live with it.		
10	I've been blaming myself for things that happened		
11	I've been praying or meditating		
12	I've been making fun of the situation		

Appendix G: Part 3: Coping Strategies Scale Continues

Instructions: Each item says something about a particular way of coping. I want to know to what extent you've been doing what the item says. How much or how frequently? Don't answer based on whether it seems to be working or not- just whether or not you're doing it. Use these response choices. Try to rate each item separately in your mind from the others. Make your answers as true FOR YOU as you can.

1	2	3	4			
I haven't been doing this at all	I've been doing this a little bit	I've been doing this for a medium amount	I have been doing this a lot			
Avoidant Coping Strategies Items			1	2	3	4
1	I've been turning to work or other activities to take my mind off things.					
2	I've been saying to myself, "This isn't real".					
3	I've been using alcohol or other drugs to make myself feel better					
4	I've been giving up trying to deal with it.					
5	I've been refusing to believe that it has happened.					
6	I've been using alcohol or other drugs to help me get through it.					
7	I've been giving up the attempt to cope.					
8	I've been doing something to think about it less, such as going to movies, watching TV, reading, playing games, sleeping, or shopping.					
9	I just gave up trying to reach my goal.					
10	I pretend that it hasn't really happened.					
11	I force myself to wait for the right time to do something					

Appendix H: Part 4: Mental Health Awareness Scale

Instructions: Below are statements about psychology and mental health awareness issues. Read each statement carefully and indicate your agreement, probable agreement, probable disagreement, or disagreement. Please express your frank opinion in rating the statements. There are **no "wrong" answers**, and the only right ones are whatever you honestly feel or believe. Please indicate your response by putting a check (✓) or line through the number that best describes your intention to seek help.

1	2	3	4	5			
Strongly Disagree	Disagree	Neither agree nor disagree	Agree	Strongly Agree			
Mental Health Awareness Scale							
Nos.	Awareness Items		1	2	3	4	5
1	People who are aware of their psychological problems are willing to seek mental health help						
2	If I had a mental illness, I would seek my friends' help						
3	If I had recognized that I had a mental problem, I would have sought my family's help or gone to a psychiatrist						
4	If a friend of mine developed a mental illness, I would talk to his/her teacher and encourage her/him to look for a psychologist						
5	Family members should be aware of any harm caused by persons with psychological or psychiatric problems						
6	At a regular interval, family members or patients should keep in contact with their psychiatrist						
7	If a friend of mine developed a mental illness, I would listen to her/him without judging or criticizing						

8	Everyone has a responsibility for preventing suicides among people with psychological or psychiatric problems.					
9	Family members should observe mentally ill persons to see whether they are taking medications properly, help them, or go to a psychiatrist					
10	If a friend of mine developed a mental disorder, I would offer her/him support					
Knowledge Items						
1	Lack of confidence is one of the psychological problems					
2	One of the symptoms of depression is the loss of interest or pleasure in most things					
3	A person with an anxiety problem may panic or try to avoid situations that make them afraid.					
4	Brain malfunctioning, or traumatic brain injury, may cause the development of mental illness.					
5	People with severe psychological or psychiatric problems often threaten others' safety.					
6	Talking over problems with someone helps to improve mental health					
7	Mental health is a component of health, like any other disease.					
8	Doing something enjoyable helps to improve mental health					

Appendix I: Part 4: Mental Health Awareness Scale Continues

Instructions: Below are statements about psychology and mental health issues. Read each statement carefully and indicate your agreement or disagreement. Please express your frank opinion in rating the statements. There are **no "wrong" answers**, and the only right ones are whatever you honestly feel or believe. Please indicate your response by putting a check (√) or line through the number that best describes your recognition of mental health conditions.

1	2	3	4	5		
Strongly Disagree	Disagree	Neither agree nor disagree	Agree	Strongly Agree		
Recognition						
Nos	Items	1	2	3	4	5
1	To what extent do you likely recognize that inability to concentrate or feeling confused is a mental health problem?					
2	To what extent do you likely recognize that getting nervous and sad (e.g., for two weeks) is a mental health problem?					
3	To what extent do you likely recognize that inability to sleep well at night (e.g., for two weeks) is a mental health problem?					
4	To what extent do you likely recognize that emotional difficulties (e.g., getting worried or feelings of guilt) are a psychological condition?					
5	To what extent do you likely recognize that extreme mood changes of highs and lows are symptoms of mental health illnesses?					
6	To what extent do you likely recognize that an attitude of staying away from friends and social activities you like requires mental health professional help?					
7	To what extent do you likely recognize that neglecting personal care is a psychological problem?					

8	To what extent do you likely recognize that experiencing headaches, stomach aches, and changes in the way you eat require mental health attention?					
9	To what extent do you likely understand that talking about problems with a psychologist is a safe decision to overcome health problems?					
10	To what extent do you likely understand that hiding our mental, emotional, social, and behavioral issues is an unhealthy practice?					

Appendix J: Part 5: Mental Health Help-Seeking Attitudes Questionnaire

Instructions: Below are statements about psychology and mental health issues. Read each statement carefully and indicate your agreement, probable agreement, probable disagreement, or disagreement. Please express your frank opinion in rating the statements. There are **no "wrong" answers**, and the only right ones are whatever you honestly feel or believe. Please indicate your response by putting a check (✓) or line through the number that best describes your intention to seek help from each help source that is listed.

1	2	3	4	5		
Extremely Unlikely	Unlikely	Neither Likely nor Unlikely	Likely	Extremely Likely		
Professional Help-seeking Scale						
Nos.	Items	1	2	3	4	5
1	If you realize you were having an attitude problem, how likely is it that you intend to seek help from a psychologist?					
2	If you realized you were experiencing mental health problems, how likely is it that you would decide to consult a psychological counselor?					
3	If you think you were worried about your behavioral practices, how likely is it that you would seek help from a psychologist?					
4	If you experience mental social stigma, how likely would you seek help from a mental health doctor (psychiatrist)?					
5	If you were experiencing sadness, nervousness, or stressful thoughts, how likely would your beliefs allow you to seek mental help?					
6	Like other sicknesses, I believe mental health problems do not require seeking help from a mental health professional					
7	If you realize you do not have mental health awareness, how likely is it that you would ask for help from a mental health doctor?					
8	Understanding the costs and time of seeking mental health help, I think it is not worth seeking help from a mental health professional					
9	If you were experiencing relationship problems, how likely is it that you would plan to seek help from a mental health practitioner?					
10	If you were experiencing a mental health illness, how likely is it that you would be motivated to seek help from a mental health professional?					