

Exploring the Interplay of Self-Efficacy, Optimism and Resilience in Promoting Psychological Well-Being and Academic Achievement of High School Students

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The present study aimed to explore the interplay of self-efficacy, optimism and resilience in promoting academic achievement of high school students in Manipur. The study assessed how these positive psychological traits impact the psychological well-being and academic success despite socio-educational challenges caused by ethnopolitical instability. The sample consisted of 50 high school students from Manipur in the age range of 13-16 years of age. The study employed a cross-sectional design and the data was collected with the help of General Self-Efficacy Scale (GSE), Revised Life Orientation Test (LOT-R), Child & Youth Resilience Measure-Revised (CYRM-R) and Psychological Well-Being Scale (42 items). The results revealed a significant positive relationship of self-efficacy, optimism, and resilience with psychological well-being and a non-significant relationship with the academic performance. The study highlights the critical role of self-efficacy, optimism, and resilience in shaping the psychological well-being of high school students in a conflict-ridden region. The findings emphasize the need for holistic educational policies that not only foster positive psychological traits but also create stable learning environments. Future research should explore additional factors influencing academic success to develop targeted interventions for students in challenging contexts.

Keywords: self-efficacy, optimism, resilience, psychological well-being, high school students, academic performance

Manipur has been facing frequent conflicts in the preceding years resulting in a significant academic disruption in the state educational system. The school educational system of Manipur has demonstrated strong performance in recent years, as reflected in its ranking in the NITI Aayog's School Education Quality Index (SEQI), 2019 (NITI Aayog, 2019, p.8). However, recurring incidence of conflicts and social upheaval in recent years could pose for a set-back to educational outcomes in the long run. The present study aims to explore the interplay of self-efficacy, optimism and resilience in promoting academic achievement of high school students in Manipur. The study will assess how these positive psychological traits impact the psychological well-being and

academic success despite socio-educational challenges caused by ethnopolitical instability.

Self-efficacy is conceptualized as individuals' beliefs in their capabilities to mobilize the motivation, cognitive resources, and agency to exert control over a given event and a strong sense of self-efficacy strengthens human accomplishment and personal well-being in many ways (Bandura, 1994; Bandura et al., 1999). Optimism refers to the generalized expectation of positive against negative outcomes in important domains of life (Scheier & Carver, 1985). Optimism is understood as an individual difference variable that reflects the extent to which people hold generalized favorable

expectancies for their future (Carver, Scheier, & Segerstorm, 2020). There are two types of optimism documented in the existing literature- learned optimism and dispositional optimism (Seligman, 2006; Scheier & Carver, 2018). According to Seligman (2006), "optimism is a tool to help the individual achieve the goals he has set for himself" (p.333). Learned optimism refers to the idea that individuals can learn to be optimistic through cognitive reframing and developing a more positive explanatory style (Seligman, 2006). According to Scheier & Carver (2018), dispositional optimism is the generalized, relatively stable tendency to expect good outcomes across important life domains.

The American Psychological Association defines resilience as the process and outcome of successfully adapting to difficult or challenging life experiences, especially through mental, emotional, and behavioral flexibility and adjustment to external and internal demands (American Psychological Association, n.d.). Dhanabhakym and M (2023) states that the concept of psychological well-being is multi-faceted and encompasses different aspects of an individual's mental and emotional health, including positive relationships, personal growth and development, positive self-esteem, and a sense of control over one's life. The components of psychological well-being include life satisfaction, positive emotions, low levels of negative emotions, autonomy, positive relationships, purpose in life, and personal growth which are interdependent and can impact each other, leading to improved overall well-being (Dhanabhakym & M, 2023).

Sabouripour et al., (2021) studied the mediating role of self-efficacy in the relationship between optimism, psychological well-being, and resilience among Iranian students and found that self-efficacy mediates the relationship between

dimensions of psychological well-being namely environmental mastery, autonomy, self-acceptance, positive relations with others, personal growth, and purpose in life and resilience. Komarraju and Nadler (2013) observed that self-efficacious students are able to achieve academically because they monitor and self-regulate their impulses and persist in the face of difficulties. The contribution of self-efficacy, optimism, and resilience on academic performance was highlighted on a study at medical undergraduate students and found a significant association between low optimism, low resilience and poor academic performance (Popa-Velea, Pirvan & Diaconescu, 2021). The results indicated solid associations between psychosocial variables and academic performance. Shengyao et al., (2024) found that positive psychological characteristics, which include self-efficacy, motivation, and resilience, mediate the relationship between emotional intelligence and psychological well-being and academic achievement. The relationship between resilience, optimism and well-being have also been explored in previous studies and the results revealed that resilience is able to predict psychological well-being and optimism played a minor mediation role in the association between resilience and psychological well-being indicating that psychological well-being is influenced by personal traits such as resilience, and the individual's optimism regardless of the level of resilience, can contribute to their overall psychological well-being (Souri & Hasanirad, 2011). Bano and Pervaiz (2020) analysed the predictive relationship between resilience, emotional intelligence and their influence on psychological well-being. While emotional intelligence is not a focus of the present study, their results found a significant predictive relationship between resilience and psychological well-being and both variables are positive in nature. Maheshwari

and Jutta (2020) highlighted the positive relationship between optimism and resilience among university students during unprecedented times and this relationship can be attributed to many factors like cultural and religious values, pain tolerance, self-efficacy and self-esteem. Komol Singha (2013) in his study titled, 'Conflict and Education in Manipur: A Comparative Analysis', presented the situation that has been prevailing in the state for many years. Manipur, one of the India's north-eastern states, has endured prolonged periods of unrest, including insurgency, secessionist movement, terrorism, ethnic clashes and resource-related conflicts which in turn impacts the education sector severely (Singha,2013).

The association between optimism, psychological well-being, and resilience has been established in several studies. Available literature also supports the positive relationship between psychological well-being and self-efficacy. The contribution of self-efficacy on academic performance has been highlighted in some studies. Most of the studies have been conducted on undergraduate students of different streams. There is a limited number of studies on high school students assessing these positive psychological traits, especially on a conflict-ridden region. Therefore, the gaps that this study discusses are related to the lack of exploring the interplay of self-efficacy, optimism, and resilience in promoting well-being and academic performance of high school students particularly in a conflict-ridden region.

Objectives

- To assess the levels of self-efficacy, optimism, and resilience among high school students in Manipur.

- To assess the relationship of self-efficacy, optimism, and resilience with psychological well-being.
- To assess the relationship of self-efficacy, optimism, and resilience with academic performance of the students.

Hypotheses

- H1 There is no significant relationship between self-efficacy and psychological well-being.
- H2 There is no significant relationship between optimism, and psychological well-being.
- H3 There is no significant relationship between resilience and psychological well-being.
- H4 There is no significant relationship between self-efficacy and academic performance.
- H5 There is no significant relationship between optimism and academic performance.
- H6 There is no significant relationship between resilience and academic performance.

Method

Research Design

The study employs a cross-sectional design to assess the levels of self-efficacy, optimism, and resilience among high school students in Manipur and examine their relationship with psychological well-being and academic performance.

Sample

The sample consists of 50 high school students in the age range of 13-16 years of age from Manipur. Convenience sampling was employed in order to collect the samples.

Tools

General Self-Efficacy Scale (GSE): The scale developed by Schwarzer and Jerusalem (1995), is a widely used tool for measuring self-efficacy. The scale consists of 10 items to assess a general sense of perceived self-efficacy such as ability to solve problems, achieve goals, and handle stress and adversity. Each item is rated on a 4-point Likert scale ranging from 1 (Not at all true) to 4 (Exactly true). The total scores, which ranges from 10 to 40, represents an individual's overall level of self-efficacy. The internal consistency of the scale was assessed for the data, demonstrating adequate internal reliability with a Cronbach's alpha of 0.75.

Revised Life Orientation Test (LOT-R): It was developed by Scheier, Carver and Bridges (1994) is a widely used instrument designed to measure dispositional optimism. The LOT-R consists of 10 items that evaluates optimism versus pessimism. Items investigate aspects such as enjoyment in social life, resistance to bad or unforeseen circumstances or ability to relax. 3 items were reversed scored and 4 items were filler items which are not scored as part of the scale. Each item is rated on a 4-point Likert scale ranging from 0 (Strongly disagree) to 4 (Strongly agree). The internal consistency of the scale was assessed for the data and the scale demonstrated moderate internal consistency with a Cronbach's alpha of 0.65.

Child & Youth Resilience Measure-Revised (CYRM-R): It was developed by Jefferies, McGarrigle and Ungar (2018) measures social-ecological resilience. Respondents rate the items on a 5-point Likert scale ranging from 1 (Not at all) to 5 (A lot). The items in the measures are all positively worded and the total scores are obtained by summing the responses. The scale demonstrated acceptable internal consistency, with a Cronbach's alpha of 0.76.

Psychological Well-Being (42 Items): It was developed by Ryff (1989) and later refined by MIDUS 2 (Midlife in the United States) study is a widely used instrument designed to assess overall psychological well-being across six dimensions covering autonomy, environmental mastery, personal growth, positive relations with others, purpose in life and self-acceptance. Although the PWB-42 was designed for adults, studies have successfully used it with adolescents to measure psychological well-being (Borah & PM, 2024). Therefore, this study employs the PWB-42 to assess the well-being of high school students considering its established validity and applicability in similar age groups. Each item is rated on a 7-point Likert Scale, ranging from 1 (Strongly disagree) to 7 (Strongly agree). 21 items are reverse scored. The internal consistency of the scale was assessed for the data and demonstrated excellent internal consistency, with a Cronbach's alpha of 0.90, indicating high reliability for assessing psychological well-being.

Procedure

The study employed a cross-sectional design. Participants were selected using convenience sampling method. Two schools in Manipur were visited during the course of the data collection. Prior to data collection, permission was obtained from the school Principal. Participants were informed about the purpose of the study and the kind of participation expected for the same. Confidentiality was strictly maintained. They were ensured that all their information would be kept confidential and used solely for research proposes. Informed consent from the participants' parents/guardians and permission to access the participant's percentage of marks in the previous year examination were obtained. Study information sheet, informed consent, assent form, student information questionnaire followed by

the data collection tools- General Self Efficacy Scale (GES), Revised Life Orientation Test (LOT-R), Child & Youth Resilience Measure-Revised (CYRM-R) and Psychological Well-Being (PWB) Scale were administered to the students. Participants were given instructions according to the questionnaires. After obtaining informed consent, the participants completed the questionnaires.

Data Analysis

Responses were coded and analysed using the SPSS Version 25. Missing data were discarded to maintain the accuracy and reliability of the results. Descriptive statistics were used to categorize students into low, moderate and high levels of self-efficacy, optimism and resilience. Multiple regression analysis was performed to examine the relationship of self-efficacy, optimism and resilience with psychological well-being. Spearman's rank-order correlation was conducted to assess the relationship of self-efficacy, optimism and resilience with academic performance. A significance level of $p < 0.05$ was used to determine the statistical significance. Prior to conducting the main analyses, assumptions of normality were assessed for the total participants' scores of GSE, LOT-R, CYRM-R, PWB and participants' grade score using the Shapiro-Wilk test. Normality was met for all the variables measured except for the participants' grade score. Multicollinearity was checked using VIF and Tolerance values to ensure that predictor variables which are self-efficacy, optimism and resilience were not highly correlated. All VIF values were below 2 indicating no severe multicollinearity issues. While linearity was met for one of the dependent variable, psychological well-being, it was not fully satisfied for the other dependent variable which is academic performance. Consequently, multiple regression was used for one dependent variable and Spearman's rank order-correlation was applied to the other.

Results

Table 1. Demographic Characteristics of the Participants

Variable	Frequency (n)	Percentage (%)
Gender		
Male	16	32.0%
Female	34	68.0%
Age		
13 years	6	12.0%
14 years	25	50.0%
15 years	16	32.0%
16 years	3	6.0%

Note. $N=50$. Participants were on an average 14.32 years old ($SD=0.768$)

Table 2 . Levels of Self-Efficacy, Optimism, and Resilience

Variable	Low (n, %)	Moderate (n, %)	High (n, %)
Self-Efficacy (GSE)	7 (14.0%)	35 (70.0%)	8 (16%)
Optimism (LOT-R)	9 (14.0%)	33 (66.0%)	8 (16%)
Resilience (CYRM-R)	7 (14.0%)	35 (70.0%)	8 (16%)

Note. n = number of participants; %= Percentage of total sample

Table 2 shows the levels of self-efficacy, optimism, and resilience among the participants. Descriptive statistics indicated that the majority of participants exhibited moderate levels across all variables.

Table 3 shows the results of multiple regression analysis examining the relationship between self-efficacy, optimism, and resilience with psychological well-being. The overall model was significant, $F(3,46) = 24.12$, $p < .001$, indicating that self-efficacy, optimism, and resilience significantly predict psychological well-being. The model explained 61% of the variance in PWB ($R^2=0.61$, Adjusted $=0.58$), suggesting strong

relationship. Self-efficacy was a significant predictor ($B=2.40$, $\beta=0.31$, $p=0.04$). Optimism showed a marginal effect ($B=1.77$,

$\beta=0.21$, $p=.053$). Resilience was the strongest predictor ($B=1.88$, $\hat{\alpha}=0.45$, $p<0.001$).

Table 3. Multiple Regression Analysis Predicting Psychological Well-Being

Variables	<i>B</i>	β	<i>SE</i>	<i>t</i>	<i>p</i>	95% CI [LL,UL]
Constant	-21.41		28.87	-.74	.462	[-79.534, 36.702]
Self-Efficacy	2.40	0.31	0.79	3.03	.004	[.808, 3.995]
Optimism	1.77	0.21	0.89	1.98	.053	[-.024, 3.570]
Resilience	1.88	0.45	0.45	3.99	<.001	[.930, 2.821]

Note. $N=50$. CI= confidence interval; LL=lower limit; UL=upper limit. *P* values are two-tailed. Dependent variable: Psychological Well-Being. Model summary: $R^2=0.61$, Adjusted $R^2=0.58$, $F(3,46)=24.12$, $p<0.001$.

Table 4. Spearman's Rank-Order Correlation Between Self-Efficacy, Optimism, Resilience, and Academic Performance

Variables	Spearman's rho (ρ)	<i>p</i>
Self Efficacy	.167	.247
Optimism	.063	.665
Resilience	.002	.990

Note. $N=50$. Spearman's rank order correlation was used. ρ =Spearman's correlation coefficient. $p<0.05$ (*), $p<0.01$ (**).

Table 4 shows the Spearman's rank order correlation between self-efficacy, optimism, resilience, and academic performance. The results indicated that self-efficacy was weakly and positively correlated with academic performance, $\rho=.167$, $p=.247$, but this relationship was not statistically significant. Similarly, optimism showed a negligible correlation with academic performance, $\rho=.063$, $p=.665$, and resilience demonstrated an almost nonexistent correlation, $\rho=.002$, $p=.990$ which was not statistically significant.

Discussion

The study assessed the levels of self-efficacy, optimism, and resilience and

explored the interplay of these variables in promoting psychological well-being and academic performance. Regression analysis revealed a significant positive relationship between self-efficacy, optimism, and resilience with psychological well-being, thus rejecting the hypotheses H1, H2 and H3 that there is no significant relationship between self-efficacy, optimism, and resilience with psychological well-being, indicating that students with higher levels of these traits tend to experience better psychological well-being. The findings are consistent with the existing literature such as the study conducted on the mediating role of self-efficacy in the relationship between optimism, psychological well-being, and resilience by Sabouripour et al. (2021). The findings also supported the study conducted by Souri and Hasanirad (2011) exploring the relationship between resilience, optimism and well-being and their results also found similar findings such as resilience being the predictor of psychological well-being and optimism played a minor mediation role in the relationship. Another objective of the study is to assess the relationship of self-efficacy, optimism, and resilience with academic performance of the students. However, the results show that these traits did not show a significant relationship with academic performance,

accepting the hypotheses H4, H5 and H6 that there is no significant relationship between self-efficacy, optimism, and resilience with academic performance, suggesting that other factors which are not under purview of the study, such as intelligence, study habits, motivation, teaching quality, or socio-economic background. This lack of significant association with academic performance contrasts with the study conducted by Popa-Velea, Pirvan and Diaconescu (2021) which found significant association between self-efficacy, optimism, and resilience with academic performance.

Conclusion

This study highlights the critical role of self-efficacy, optimism, and resilience in shaping the psychological well-being of high school students in a conflict-ridden region. While these traits significantly contribute to well-being, they do not exhibit significant associations with academic performance, suggesting that external disruptions such as conflict and unrest and other stressors can impact academic performance and also structural factors such as educational system, social and cultural norms and school infrastructure can influence the outcome. The findings emphasize the need for holistic educational policies that not only foster positive psychological traits but also create stable learning environments. Future research should explore additional factors influencing academic success to develop targeted interventions for students in challenging contexts. The study presents notable limitations that should be considered. The study was conducted as a cross-sectional study therefore lacks explanation of causal relationships. Representativeness of the sample was not maintained due to the use of a convenience sampling method. The study relies on self-reported measures for self-efficacy, optimism, resilience, and psychological well-being, which are subject to social desirability bias and personal

interpretation. The finding of this study may have limited generalizability, since the participants were selected based on accessibility rather than random sampling, the sample may not fully represent the broader student population. More studies are needed to explore other factors such as family support, study environment, teacher involvement, coping mechanisms etc. that may mediate the relationship between psychological traits and academic performance.

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