# The Influence of Psychological Capital, Organizational Commitment and Psychological Contract on Teachers' Innovative Behavior at MTs Muhammadiyah 9 Weru.

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**Abstract.** This research examines how psychological capital, dedication to the organization, and the psychological contract impact the creative actions of educators, with self-efficacy acting as a mediating factor at MTs Muhammadiyah 9 Weru. A quantitative methodology was utilized, involving a sample of 30 educators as participants. Information was gathered through surveys and analyzed with the Statistical Package for the Social Sciences (SPSS) version 22. The findings indicate that psychological capital, organizational dedication, and the psychological contract have a notable effect on the innovative actions of teachers, both directly and indirectly through self-efficacy. Additionally, self-efficacy plays a vital mediating role in enhancing the connection between these psychological and organizational elements and creative behavior. These results highlight the significance of psychological assets and organizational commitment in promoting the innovative performance of teachers.

**Keywords:** Psychological Capital, Organizational Commitment, Teacher Innovative Behavior, Self-Efficacy.

## 1. Introduction

The quality of a country's education system is primarily shaped by the skills and dedication of its educators. The National Education System aims to guarantee fair access, elevate standards, and boost the applicability and effectiveness of education to tackle local, national, and international challenges. Educators hold a pivotal position in achieving these goals, as they are directly accountable for molding students' learning journeys and intellectual growth. Under Law No. 14 of 2005 concerning Teachers and Lecturers, teachers are recognized as professional instructors with core responsibilities that include teaching, mentoring, training, evaluating, and appraising learners at every stage of formal schooling.

In this age of swift technological progress, instructors are required to offer captivating and impactful learning opportunities. Innovative conduct among teachers emerges as a vital element for enhancing educational standards and fulfilling institutional objectives. Educators exhibiting robust innovative traits are more adept at pinpointing and resolving issues, devising fresh

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instructional methods, and adjusting to new educational tools [1]. On the flip side, a lack of innovation can obstruct the teaching process and restrict student success.

MTs Muhammadiyah 9 Weru, situated in Weru Village, Paciran District, Lamongan Regency, functions under the oversight of the Muhammadiyah Lamongan Regional Leadership and the Ministry of Religious Affairs. Over the last five years, internal hurdles such as sporadic compliance with school policies, minimal teamwork among staff, and poor time management have impacted teacher productivity. These behavioral challenges highlight the necessity to bolster elements affecting teachers' innovative conduct, encompassing psychological capital, organizational commitment, and psychological contracts.

Prior studies indicate that educators' innovative behavior is significantly shaped by internal psychological elements and workplace environments [2], [3]. Psychological capital—which includes self-efficacy, optimism, hope, and resilience—plays a key role in how people confront obstacles and strive toward objectives. In contrast, organizational commitment and psychological contracts affect teachers' feelings of allegiance, accountability, and involvement in their roles [4].

Considering these factors, this research seeks to investigate the impact of psychological capital, organizational commitment, and psychological contracts on teachers' innovative behavior, with self-efficacy acting as a mediating factor at MTs Muhammadiyah 9 Weru.

## 2. Literature Review

### Psychological Capital

Psychological capital is about having a good mindset, which includes feeling confident, hopeful, resilient, and optimistic. These qualities help people be motivated and do well at their jobs [5]. Psychological capital is defined as a positive growth state of an individual, consisting of four key components known as “HERO”: Hope, Efficacy, Resilience, and Optimism [6].

a. Hope means being able to find different ways to reach goals even when faced with problems and keeping the drive to get there.
b. Optimism is about looking forward to the future in a positive way, which helps people keep going when things get tough.
c. Resilience is the ability to bounce back from failures and adjust to new situations.
d. Self-efficacy is having faith in one’s ability to handle tasks and overcome challenges.

Individuals who possess a significant amount of psychological capital tend to be more flexible, proficient in managing workloads, and innovative thinking.

### Organizational Commitment

Organizational commitment means how emotionally and mentally connected people feel to their workplace. This connection shows up through their loyalty, sense of duty, and the desire to meet

the organization's goals [7]. There are three main parts to this commitment: affective, continuance, and normative [8]. Affective commitment is about how emotionally tied someone is to the organization. Continuance commitment focuses on what it would cost someone to leave the organization. Normative commitment comes from feeling a moral duty to stay with the organization. When teachers feel strongly committed to their organization, they tend to work hard and creatively to bring new learning methods into their classrooms.

**Psychological Contract**

The psychological contract refers to the unwritten set of mutual expectations between employees and employers concerning fairness, trust, and professional development opportunities [9]. When institutions fulfill their implicit promises, employees develop stronger trust and motivation, resulting in increased innovative behavior [10]. Conversely, the violation of this psychological contract may reduce job satisfaction, commitment, and innovative performance.

**Innovative Behavior**

Innovative behavior involves the process of generating, promoting, and implementing new ideas or methods within a professional context [11]. It generally progresses through three stages: idea generation, idea promotion, and idea realization [12]. In educational institutions, innovative behavior among teachers manifests through the creation of creative teaching strategies, collaboration with peers, and the practical application of new learning approaches that enhance teaching quality.

**Self Efficacy**

Self-efficacy is an individual's belief in their ability to plan and execute actions required to achieve desired outcomes [13]. It influences motivation, perseverance, and problem-solving capacity when facing challenges. Teachers with high self-efficacy are confident in experimenting with new teaching techniques, managing classrooms effectively, and maintaining enthusiasm in achieving educational goals. Self-efficacy mediates the relationship between psychological and organizational factors and innovative behavior, allowing individuals to translate positive psychological resources into creative and productive work [14].

**Relation Between Variables**

Empirical evidence indicates that psychological capital has a positive and significant influence on innovative behavior [15]. Organizational commitment contributes to the willingness of individuals to engage in creativity and change [16]. Similarly, the fulfillment of psychological contracts promotes trust and cooperation, fostering innovation in the workplace [17]. Self-efficacy serves as a mediating variable that strengthens the relationship between psychological capital, organizational commitment, and psychological contracts with innovative behavior [18].

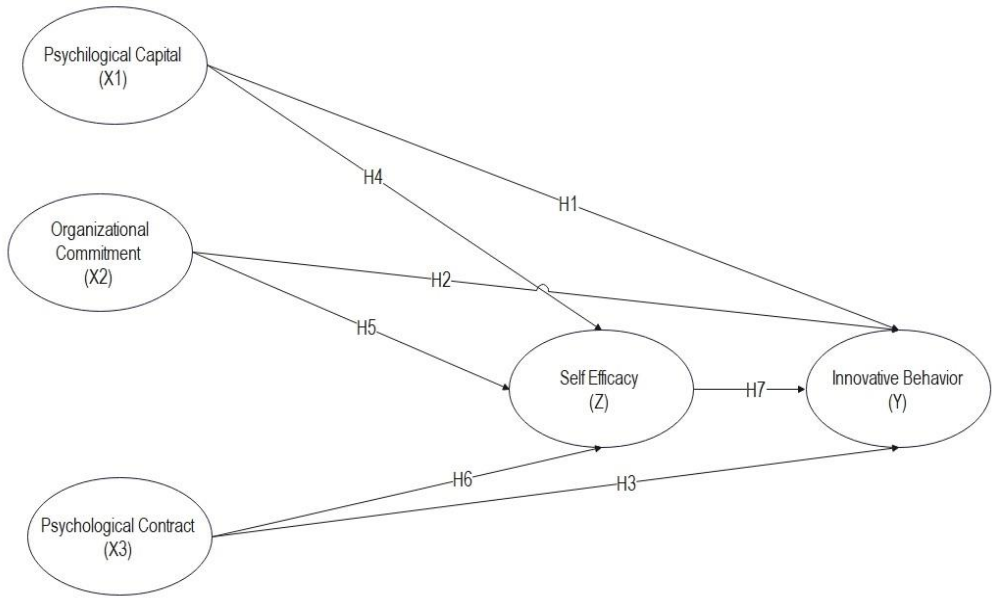


**Figure 1.** Research Framework

## 3. Research Method

### Research Design

This study employed a quantitative research approach to analyze the influence of psychological capital, organizational commitment, and psychological contract on teachers' innovative behavior, with self-efficacy as a mediating variable. Quantitative methods are appropriate for testing hypotheses through numerical data and statistical analysis [19]. The study used a causal design to identify direct and indirect relationships among variables.

This type of research is descriptive quantitative. as for this study, the variables include intensive studies on Psychological Capital, Organizational Commitment, and Psychological Contracts through Self-Efficacy on Teachers' Innovative Behavior. The research is explanatory in nature which intends to provide an explanation of the causal relationship between variables through hypothesis testing as well as explaining. In this study, the explanatory method is used to determine the effect of Psychological Capital, Organizational Commitment, and Psychological Contract through Self-Efficacy on Teachers' Innovative Behavior.

The research was conducted at MTs Muhammadiyah 9 Weru, located in Weru Village, Paciran District, Lamongan Regency, Indonesia. The institution operates under the supervision of the Muhammadiyah Regional Leadership and the Ministry of Religious Affairs.

**Population and Sample**

The population consisted of all teachers at MTs Muhammadiyah 9 Weru. A total of 30 teachers participated in this study, selected using simple random sampling because the population was considered homogeneous [20].

The sampling technique used was simple random sampling, where each population member had an equal opportunity to be chosen as part of the sample [21]. The selection of participants was conducted randomly without regard to population strata. To measure respondents' opinions, this study employed a Likert scale, which is commonly used to assess the degree of agreement or disagreement with a set of statements related to the research variables [22]. Each item consists of five categories ranging from "strongly agree" to "strongly disagree." Scores were assigned to each response to allow quantitative analysis of the data [23].

**Measurement Instruments**

A five-point Likert scale was used to measure responses, ranging from 1 (strongly disagree) to 5 (strongly agree). The scoring system is shown in Table 1.

**Table 1.** Likert Scale Scoring System

| Respone Option | Score |
|---|---|
| Answer strongly agree | 5 |
| Agree answer | 4 |
| Undecided answer | 3 |
| Disagree answer | 2 |
| Strongly disagree answer | 1 |

**Operational Definitions of Variables**

This study included three independent variables (psychological capital, organizational commitment, and psychological contract), one mediating variable (self-efficacy), and one dependent variable (innovative behavior). The indicators of each variable are presented in Tables 2 to table 6.

Table 2 shows that psychological capital is reflected in a teacher's ability to maintain positive expectations and perseverance despite obstacles. Teachers who display optimism, hope, and resilience are more capable of managing challenges in achieving professional goals.

As presented in Table 3, organizational commitment is demonstrated through loyalty and adherence to institutional values. Teachers who strongly identify with the school's mission and demonstrate consistency in their work show high organizational commitment.

Table 4 shows that the psychological contract emphasizes collaboration, trust, and alignment between individual responsibilities and institutional expectations. When teachers perceive that these mutual obligations are maintained, they are more likely to demonstrate loyalty and innovative engagement in their professional duties.

Table 5 shows that teacher innovative behavior is reflected through the ability to generate, communicate, and implement creative ideas. These behaviors support the development of new learning methods and problem-solving initiatives that enhance educational quality.

**Table 2.** Indicators of Psychological Capital

| Indicator | Description |
|---|---|
| Hope | Taking responsibility and finding solutions when facing difficulties. |
| Optimistic | Belief in the ability to achieve goals under various conditions. |
| Resilience | Adaptability to new rules and environmental changes. |

**Table 3.** Indicators of Organizational Commitment

| Indicator | Description |
|---|---|
| Affective | Willingness to uphold the school's vision and mission. |
| Continuous | Consistency in fulfilling teaching duties and schedules. |
| Normative | Compliance with institutional rules and standard procedures. |

**Table 4.** Indicators of Psychological Contract

| Indicator | Question |
|---|---|
| Shared Liability | Teachers are willing to work collaboratively and participate actively in team activities. |
| Trust in promise | Teachers complete their assigned tasks punctually and fulfill responsibilities as expected. |
| Agreement with the organization | Teachers willingly perform duties in accordance with their respective fields of expertise. |

**Table 5.** Indicators of Teacher Innovative Behavior

| Indicator | Description |
|---|---|
| Creating ideas | Teachers are able to propose ideas or solutions to address school-related problems. |
| Sharing ideas | Teachers are able to share and discuss innovative ideas with colleagues. |
| Idea realization | Teachers are able to transform ideas into concrete programs or implemented solutions in the school environment. |

**Table 6.** Indicators of Self-Efficacy

| Indicator | Description |
|---|---|
| Confidence | Teachers are confident in completing their school tasks and responsibilities effectively. |
| Motivation | Teachers can motivate themselves to accomplish their duties and maintain enthusiasm in performing their roles. |
| Survive | Teachers are able to persist and remain consistent when facing problems or obstacles during their work. |

**Data Analysis Technique**

**Validity Test**

The validity test is to determine whether the indicators as a constituent can measure what should be measured. In this study using the total item correlation which can be assessed from the SPSS printout, namely, by determining whether each item validly measures the variable being tested. Test the validity in this study by comparing the corrected item total correlation value which must be greater than the Pearson table r value at α 0.05. Pearson's product moment correlation formula, namely:

$$r = \frac{N(\Sigma xy) - (\Sigma x \Sigma y)}{\sqrt{\left[N\Sigma x^2 - (\Sigma x)^2\right]\left[N\Sigma y^2 - (\Sigma y)^2\right]}}$$

Note :
X = Item score
Y = Total score
XY = Question Score
N = Number of respondents to be tested
R = *Product moment* correlation

The validity test is carried out at a significant level of 95% or α = 0.05 with the provisions:
1) If r count is positive, and r count> r table α 0.05 df n-2, then the item or item is valid.
2) If r count is not positive (negative), or r count < r table α 0.05 df n-2, then the item or item is invalid.

**Reliability Test**

Reliability refers to an understanding that an instrument can be trusted enough to be used as a data collection tool because the instrument is good. A good instrument will not tend to direct respondents to choose certain answers. To find out that a measuring instrument is variable, it can be tested by using the alpha formula as follows:

$$r_{11} = \left[\frac{k}{(k-1)}\right]\left[1 - \frac{\sum \sigma b^2}{\sigma_1^2}\right]$$

Note :
$r_{11}$ = Instrument Reliability
k = Number of questions or number of questions
$\sum \sigma^2 b$ = Sum of Item Variances
$\sigma 1^2$ = Total Variance

The Alpha formula is used to find the reliability of instruments whose scores are not 1 and 0, for example a questionnaire or question form description. If the variance under study has Cronbach's alpha $\alpha$ > 70% (0.70) then the variable is said to be reliable, otherwise Cronbach's alpha $\alpha$ < 70% (0.70) then the variable is said to be unreliable.

**Sobel Test**

Testing the mediation hypothesis can be done with procedures developed by the sobel test. The sobel test is carried out by testing the strength of the indirect effect of the independent variable (X) to the mediating variable (Z) through the Intervening variable (Y), which in this study is the mediating effect of Self-Efficacy on the effect of Psychological Capital, Organizational Commitment and Psychological Contracts on Teachers' Innovative Behavior $b^2$ sa+ a sb+$sa^{22}$ .$sb^2$

$$sab = \sqrt{\text{b2sa} + \text{a2sb} + \text{sa2.sb2}}$$

Note :
Sa = standard error of coefficient a
Sb = standard error of coefficient b
b = coefficient of the mediating variable
a = coefficient of independent variable

To test the significance of the indirect effect, it is necessary to calculate the t value of the ab coefficient with the following formula:

$$t = \frac{\text{ab}}{sab}$$

The tcount value is compared with the ttable value, if the tcount> ttable value, it can be concluded that there is a mediating influence.

## 4. Result and Discussion

**Respondent Characteristics.**

The number of respondents sampled in this study was 30 teachers from Madrasah Tsanawiyah Muhammadiyah 09 Weru Paciran Lamongan. The demographic characteristics analyzed include gender, age, and educational background. From Table 7, it can be observed that 45% of the respondents are male, while 55% are female, indicating a relatively balanced gender distribution among the teachers.

Based on the table 8, the lowest number of ages is respondents with ages 20-25 years, namely 3% as many as 1 teacher, ages 26-30 years, namely 9% as many as 3 teachers, ages 31-35 years, namely 12% as many as 4 teachers, ages 36-40 years, namely 6% as many as 2 teachers, ages 41-45 years, namely 35% as many as 10 teachers, while for respondents with the oldest age, namely 45-50 years, namely 35% as many as 10. from the data above, it can be concluded that the majority of teachers at MTs Muhammmadiyah Weru are mature, namely 41-50 years.

Table 9 shows that 73% of the teachers hold a bachelor's degree, while 20% hold postgraduate qualifications, indicating that most respondents have sufficient academic competence.

**Table 7.** Distribution of Respondents Based on Gender

| No. | Gender | Frequency | Percentage |
|---|---|---|---|
| **1.** | Male | 14 | 45 % |
| **2.** | Female | 16 | 55 % |
| | **Total** | 30 | 100 % |

Source: Primary Data (processed in 2023)

**Table 8.** Distribution of Respondents Based on Age

| Scale | Age | Total | Percentage |
|---|---|---|---|
| 1 | 20-25 Years | 1 | 3% |
| 2 | 26-30Years | 3 | 9% |
| 3 | 31-35 Years | 4 | 12% |
| 4 | 36-40 years old | 2 | 6% |
| 5 | 41-45 years old | 10 | 35% |
| 6 | 46-50years | 10 | 35% |

Source: Primary Data (processed in 2023)

**Table 9.** Respondent Scale

| Education | Total | percentage |
|---|---|---|
| High school equivalent | 3 | 7% |
| Graduate Bachelor Degree | 23 | 73% |
| Postgraduate Degree | 4 | 20% |

Source: Data Processed 2023

**Descriptive Statistics of Variables**

This section presents a description of each research variable obtained through questionnaire responses. The interpretation uses the percentage of agreement from respondents. Based on table 10, it can be explained that the highest percentage agrees, namely that teachers are able to take responsibility when obstacles occur in their work and teachers are able to work in any situation,

each of which is 67%, while for the highest percentage of strongly agree, namely the teacher is ready to implement and adjust new rules or policies by 40%. This can explain that teachers are able to take responsibility when obstacles or problems occur in their work and teachers are ready to adjust to new policies and rules at school.

**Table 10.** Psychological Capital Data Results

| Psychological Capital | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|
| Question Item | | Question Choices | | | | | | | | | |
| | | STS | % | TS | % | N | % | S | % | SS | % |
| X.2.1 | Teachers are able to take responsibility when obstacles arise in their work. | 0 | 0% | 0 | 0% | 0 | 0% | 20 | 67% | 10 | 33% |
| X.2.2 | Teachers are able to work in any situation. | 0 | 0% | 0 | 0% | 0 | 0% | 20 | 67% | 10 | 33% |
| X.2.3 | Teachers are ready to implement and adapt to new rules or policies. | 0 | 0% | 0 | 0% | 0 | 0% | 18 | 60% | 12 | 40% |

**Table 11.** Organizational Commitment Data Result

| Organizational Commitment | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| Question Item | | Question Choices | | | | | | | | | |
| | | STS | % | TS | % | N | % | S | % | SS | % |
| X.2.1 | Teachers are willing to implement the school's goals and vision and mission | 0 | 0% | 0 | 0% | 0 | 0% | 18 | 60% | 12 | 40% |
| X.2.2 | Teachers are willing to work according to the schedule set by the school. | 0 | 0% | 0 | 0% | 0 | 0% | 20 | 67% | 10 | 33% |
| X.2.3 | Teachers are willing to work in accordance with school SOPs | 0 | 0% | 0 | 0% | 0 | 0% | 21 | 70% | 9 | 30% |

Based on table 11, it can be explained that the highest percentage agrees that teachers are willing to work according to the school's Standard Operating Procedures by 70%, while for the highest percentage strongly agrees that teachers are willing to carry out the goals and vision of the school by 40%. This can explain that teachers have a high sense of commitment in carrying out the goals, rules and policies in the school.

**Table 12.** Psychological Contract Data Results

| Psychological Contract | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| | Question Item | Question Choices | | | | | | | | | |
| | | STS | % | TS | % | N | % | S | % | SS | % |
| X.2.1 | Teachers are willing to work as a team or collaboratively | 0 | 0% | 0 | 0% | 0 | 0% | 21 | 70% | 9 | 30% |
| X.2.2 | Teachers are able to complete assignments on time | 0 | 0% | 0 | 0% | 0 | 0% | 13 | 43% | 17 | 57% |
| X.2.3 | Teachers are willing to carry out tasks according to their respective fields | 0 | 0% | 0 | 0% | 1 | 3% | 13 | 43% | 16 | 53% |

Based on table 12, it can be explained that the highest percentage agrees that teachers are willing to work in teams or together at 70%, while for the highest percentage strongly agrees that teachers are able to complete tasks on time at 57%. This can explain that teachers are able to work in teams and teachers are able to complete their work at school on time.

**Table 13.** Innovative Behavior Data Results

| Innovative Behavior | | | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| | Question Item | Question Choices | | | | | | | | | |
| | | STS | % | TS | % | N | % | S | % | SS | % |
| Y.1 | Teachers are able to provide ideas or solutions to problems at school. | 0 | 0% | 0 | 0% | 0 | 0% | 13 | 43% | 17 | 57% |
| Y.2 | Teachers are able to share ideas with other teachers. | 0 | 0% | 0 | 0% | 0 | 0% | 21 | 70% | 9 | 30% |
| Y.3 | Teachers are able to implement ideas into programs or solutions at school. | 0 | 0% | 0 | 0% | 0 | 0% | 11 | 37% | 19 | 63% |

Based on table 13, it can be explained that the highest percentage of agree is on teachers being able to share ideas with other teachers, namely 70%, while for the highest percentage of strongly agree, namely teachers being able to realize ideas into a program or solution at school by 63%. This can explain that teachers are able to share ideas with other teachers and teachers are able to realize ideas into a program or solution to problems at school.

**Table 14.** Self-Efficacy Data Results

| | Question Item | Self-Efficacy | | | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| | | Question Choices | | | | | | | | | |
| | | **STS** | **%** | **TS** | **%** | **N** | **%** | **S** | **%** | **SS** | **%** |
| | Applicable Regulation | | | | | | | | | | |
| Z.1 | Teachers are confident in completing school assignments. | 0 | 0% | 0 | 0% | 0 | 0% | 19 | 63% | 11 | 37% |
| Z.2 | Teachers can motivate themselves to complete their responsibilities at school. | 0 | 0% | 0 | 0% | 0 | 0% | 16 | 53% | 14 | 47% |
| Z.3 | Teachers are able to persevere when problems or obstacles arise. | 0 | 0% | 0 | 0% | 0 | 0% | 13 | 43% | 17 | 57% |

Based on table 14, it can be explained that the highest percentage agreed that teachers were confident that they could complete tasks at school by 63%, while for the highest percentage strongly agreed that teachers were able to survive when there were obstacles or problems that occurred in their work by 57%. This can explain that teachers feel confident and confident in completing their tasks at school, and teachers are able to survive when problems or obstacles occur in their work.

**Validity and reliability test**

There are important requirements that apply to a questionnaire, namely valid and reliable. A questionnaire can be said to be valid if the items on the questionnaire are able to reveal what the questionnaire will measure. Meanwhile, the questionnaire is reliable if the respondents' answers to the variables are consistent over time or the answers given by one another will be the same. If the questionnaire items can be used as predictors of the variables under study.

These items if they have a validity value> from 0.361 then the items are said to be valid and reliable *Cronbach's* alpha> 70% (0.07).

**Table 15.** Validity and Reliability Test

| **Validity And Reliability Test** | | |
|---|---|---|
| Psychological Capital | value | *alpha* |
| $X_1$ .1 | 0.743 | |
| $X_1$ .2 | 0.677 | 0.758 |
| $X_1$ .3 | 0.846 | |

| Validity And Reliability Test | | |
|---|---|---|
| ORGANIZATIONAL COMMITMENT | Value | *alpha* |
| $X_2$ .1 | 0.919 | |
| $X_2$ .2 | 0.600 | 0.815 |
| $X_2$ .3 | 0.878 | |
| PSYCHOLOGICAL CONTRACT | Value | *alpha* |
| $X_3$ .1 | 0.662 | |
| $X_3$ .2 | 0.544 | 0.755 |
| $X_3$ .3 | 0.831 | |
| INNOVATIVE BEHAVIOR | Value | *alpha* |
| $Y_1$ .1 | 0.855 | |
| $Y_1$ .2 | 0.457 | 0.817 |
| $Y_1$ .3 | 0.581 | |
| SELF-EFFICACY | Value | *alpha* |
| Z1.1 | 0.491 | |
| Z1.2 | 0.745 | 0.875 |
| Z1.3 | 0.613 | |

Based on the results of data processing on the overall data results, it is concluded that all questionnaire items are said to be valid because the value of *r* count is greater than *r* table with a significance level of 5%, namely, 0.361. From the results of the validity test, it can be concluded that all the question items in this research questionnaire are declared reliable or valid.

Likewise, referring to the data above, it can be concluded that the *Cronbach's Alpha* value in this study is greater than 0.7 Thus, all variables in this study are declared reliable or reliable**,**

**Sobbel Test**

The next test is to observe the significance value of the influence between variables by looking at the parameter coefficient value and the significance value of the T statistic using the *Bootstrapping* method (Ghozali & Latan, 2015). In hypothesis testing, it can be observed based on the T-Statistic value and the probability value For hypothesis testing, namely through the use of statistical values so that for *Alpha* 5% the T-Statistic value used is 1.690 which makes the criteria for acceptance / rejection of the hypothesis is that Ha is accepted and H0 is rejected if the T-Statistic> 1.690. To reject / accept the hypothesis, use the probability so that Ha is accepted if the P *Value* value <0.05.

**Sobel Test $X_1$ (Psychological Capital)**

DIRECT AND TOTAL EFFECTS
Coeff s.e. t Sig(two)
b(YX) 1.4965 ,1058 14.1456 ,0000
b(MX) ,4965 ,1058 4,6930 ,0001
b(YM.X) 1,0000 ,0000 122174108 ,0000
b(YX.M) 1,0000 ,0000 163282554 ,0000

INDIRECT EFFECT AND SIGNIFICANCE USING NORMAL DISTRIBUTION
Value s.e. LL95CI UL95CI Z Sig(two)
Effect ,4965 ,1058 ,2891 ,7038 4,6930 ,0000
BOOTSTRAP RESULTS FOR INDIRECT EFFECT
Data Mean s.e. LL99 CI LL95CI UL95CI UL99CI
Effect ,4965 ,5013 ,1048 ,2669 ,3163 ,7268 ,8091

For the results of direct effect and total effect, the value of b ($YX_1$ ) is the total effect of variable (Y) on variable ($X_1$ ) with a coefficient value of 1.4965 and a significance of 0.0000. The value of b ($MX_1$ ) is the effect of the mediator variable Self-Efficacy (M) on the variable ($X_1$ ), the coefficient value obtained is 0.4965 with a significance of 0.0001. The value of b ($YM.X_1$ ) is the value of the effect of the mediating variable (M) on (Y) by controlling the independent variable ($X_1$ ), the coefficient value is 1.0000 with a significance of 0.0000. The value of b ($YX_1$ .M) is the effect of the independent variable Psychological Capital ($X_1$ ) on the variable Teacher Innovative Behavior (Y) by controlling the Self-Efficacy variable (M), the coefficient value obtained is 1.0000 with a significance of 0.0000.

The indirect effect results from bootstraping, which do not assume a normal distribution and the sample used is also small, produce a coefficient value of 0.4965 with a standard error of 0.1048, this error value is greater than the standard error in testing with the assumption of a normal distribution of 1.690. So with bootstraping testing, the z-count value is 0.4965/0.1048 = 4.737. This result is greater than the z-count value by testing with the assumption of normal distribution, which is 4,737 and higher than the z-table value of 1,690 (5% significance level). So it can be clearly concluded that Self-Efficacy is significantly able to mediate the relationship between the influence of Psycholgical Capital variables on Teacher Innovative Behavior.

**Sobel Test $X_2$ (Organizational Commitment)**

DIRECT AND TOTAL EFFECTS
Coeff s.e. t Sig(two)
b(YX) 1.1775 ,3640 3.2348 ,0031
b(MX) ,2847 ,1924 1,4796 ,1501
b(YM.X) 1.7109 ,1553 11.0142 ,0000

b(YX.M) ,6904 ,1642 4.2037 ,0003

INDIRECT EFFECT AND SIGNIFICANCE USING NORMAL DISTRIBUTION
Value s.e. LL95CI UL95CI Z Sig(two)
Effect ,4871 ,3335 -,1666 1,1408 1,4606 ,1441
BOOTSTRAP RESULTS FOR INDIRECT EFFECT
Data Mean s.e. LL99 CI LL95CI UL95CI UL99CI
Effect ,4871 ,4865 ,3160 -,3937 -,1240 1,1111 1,3429

For the results of direct effect and total effect, the value of b ($YX_2$ ) is the total effect of variable (Y) on variable ($X_2$ ) with a coefficient value of 1.1775 and a significance of 0.0031. The value of b ($MX_2$ ) is the effect of the mediator variable Self-Efficacy (M) on the variable ($X_2$ ), the coefficient value obtained is 0.2847 with a significance of 0.1501. The value of b ($YM.X_2$ ) is the value of the effect of the mediating variable (M) on (Y) by controlling the independent variable ($X_2$ ), the coefficient value is 1.709 with a significance of 0.0000. The value of b ($YX_2$ .M) is the effect of the independent variable Organizational Commitment ($X_2$ ) on the variable Teacher Innovative Behavior (Y) by controlling the variable Self-Efficacy (M), the coefficient value obtained is 0.6904 with a significance of 0.0003.

The indirect effect results from bootstraping, which do not assume a normal distribution and the sample used is also small, produce a coefficient value of 0.4871 with a standard error of 0.3160, this error value is greater than the standard error in testing with the assumption of a normal distribution of 1.690. So, with bootstraping testing, the z-count value is 0.4871/0.3160 = 1.5414. This result is greater than the z-count value by testing with the assumption of normal distribution, which is 1.5414 and higher than the z-table value of 1.690 (5% significance level). So it can be clearly concluded that Self-Efficacy is significantly able to mediate the relationship between the influence of the Organizational Commitment variable on Teacher Innovative Behavior.

**Sobel Test $X_3$ (Psychological Contract)**

DIRECT AND TOTAL EFFECTS
Coeff s.e. t Sig(two)
b(YX) ,9822 ,2968 3.3091 ,0026
b(MX) ,3905 ,1464 2,6675 ,0126
b(YM.X) 1.7271 ,2044 8.4498 ,0000
b(YX.M) ,3078 ,1773 1.7355 ,0940

INDIRECT EFFECT AND SIGNIFICANCE USING NORMAL DISTRIBUTION
Value s.e. LL95CI UL95CI Z Sig(two)
Effect ,6745 ,2668 ,1515 1,1975 2,5277 ,0115
BOOTSTRAP RESULTS FOR INDIRECT EFFECT

| Data | Mean | s.e. | LL99 CI | LL95CI | UL95CI | UL99CI |
|---|---|---|---|---|---|---|
| Effect | ,6745 | ,6721 | ,2352 | ,0573 | ,2057 | 1.1599 1.3121 |

For the results of direct effect and total effect, the value of b ($YX_3$ ) is the total effect of variable (Y) on variable ($X_3$ ) with a coefficient value of 0.9822 and a significance of 0.0026. The value of b ($MX_3$ ) is the effect of the mediator variable Self-Efficacy (M) on the variable ($X_3$ ), the coefficient value obtained is 0.3905 with a significance of 0.0126. The value of b ($YM.X_3$ ) is the value of the effect of the mediating variable (M) on (Y) by controlling the independent variable ($X_3$ ), the coefficient value is 1.7271 with a significance of 0.0000. The value of b ($YX_3$ .M) is the effect of the independent variable Psychological Contract ($X_3$ ) on the variable Teacher Innovative Behavior (Y) by controlling the variable Self-Efficacy (M), the coefficient value obtained is 0.3078 with a significance of 0.0940.

The indirect effect results from bootstraping, which do not assume a normal distribution and the sample used is also small, produce a coefficient value of 0.6745 with a standard error of 0.2352, this error value is greater than the standard error in testing with the assumption of a normal distribution of 1.690. So with bootstraping testing, the z-count value is 0.6745/0.2352 = 2.8677. This result is greater than the z-count value by testing with the assumption of normal distribution, which is 2.8677 and higher than the z-table value of 1.690 (5% significance level). So, it can be clearly concluded that Self-Efficacy is significantly able to mediate the relationship between the influence of the Psychological Contract variable on Teacher Innovative Behavior.

**Discussion**

**Hypothesis 1 (Effect of Psychological Capital on Innovative Behavior)**

Based on the data analysis results, there is a significant influence between Psychological Capital (X1) and Innovative Behavior (Y). The coefficient value of b(YX1) is 1.4965 with a significance of 0.0000, indicating a strong positive relationship. This means that higher Psychological Capital contributes positively to teachers' Innovative Behavior. Individuals with high Psychological Capital tend to demonstrate confidence, optimism, and resilience that enhance their innovative performance in the workplace. This finding aligns with previous research showing that Psychological Capital positively influences innovative behavior [26].

**Hypothesis 2 (Organizational Commitment to Innovative Behavior)**

The data analysis indicates that Organizational Commitment (X2) significantly affects Innovative Behavior (Y), with a coefficient value of b(YX2) = 1.1775 and a significance of 0.0031. This result shows that higher Organizational Commitment leads to stronger Innovative Behavior among teachers. A teacher who is emotionally attached and loyal to their institution tends to be more proactive and willing to innovate. This finding is consistent with research explaining that Organizational Commitment positively affects employees' innovative performance [27].

**Hypothesis 3 (Psychological Contract on Innovative Behavior)**

The analysis results show a significant influence between the Psychological Contract (X3) and Innovative Behavior (Y), with a coefficient value of b(YX3) = 0.9822 and a significance of 0.0026. The stronger the Psychological Contract perceived by teachers, the more likely they are to display innovative behavior. This demonstrates that mutual trust and perceived obligations between teachers and the institution foster creativity and innovation. These findings are consistent with the theoretical framework of psychological contracts in organizational contexts [28].

**Hypothesis 4 (Psychological Capital on Self-Efficacy)**

The data analysis indicates that Psychological Capital (X1) significantly affects Self-Efficacy (Z). The coefficient value of b(MX1) = 0.4965 with a significance of 0.0001 shows that Psychological Capital strongly supports the development of teachers' self-efficacy. Teachers who possess hope, resilience, and optimism are more confident in their ability to accomplish tasks successfully. This result supports the concept of Self-Efficacy as proposed by Bandura [10] and is also aligned with research indicating a positive relationship between Psychological Capital and Self-Efficacy [29].

**Hypothesis 5 (Organizational Commitment to Self-Efficacy)**

Based on the analysis results, Organizational Commitment (X2) positively influences Self-Efficacy (Z), with a coefficient value of b(MX2) = 0.2847 and significance level of 0.1501. Although the significance value is moderate, the relationship indicates that teachers with higher commitment to their institutions tend to develop stronger self-belief in their teaching abilities. This supports studies suggesting that organizational commitment contributes to confidence and motivation in achieving institutional goals [30].

**Hypothesis 6 (Psychological Contract on Self-Efficacy)**

The analysis results show a significant influence between the Psychological Contract (X3) and Self-Efficacy (Z), with a coefficient value of b(MX3) = 0.3905 and significance of 0.0126. A strong psychological contract builds a sense of trust and security that enhances teachers' confidence to complete their tasks effectively. This finding supports the argument that fulfilling psychological expectations in an organization improves individual self-efficacy [31].

**Hypothesis 7 (Innovative Behavior on Self-Efficacy)**

The analysis shows a significant relationship between Innovative Behavior (Y) and Self-Efficacy (Z). Teachers who engage in creative and innovative practices tend to have stronger confidence in their abilities to succeed. This implies that self-efficacy is not only a determinant

of innovation but also a reinforcing outcome. This aligns with findings that self-efficacy and innovative behavior are positively correlated [32].

**Hypothesis 8 (Effect of Psychological Capital on Innovative Behavior through Self-Efficacy)**

The analysis results indicate an indirect influence between Psychological Capital (X1) and Innovative Behavior (Y) through Self-Efficacy (Z). The coefficient value b(YX1.M) = 1.0000 with a significance of 0.0000 indicates a strong mediating effect. Self-efficacy acts as an important intermediary that enhances the influence of Psychological Capital on innovative performance. This supports findings that self-efficacy mediates the relationship between positive psychological attributes and innovative outcomes [33].

**Hypothesis 9 (Effect of Organizational Commitment on Innovative Behavior through Self-Efficacy)**

The results reveal an indirect influence between Organizational Commitment (X2) and Innovative Behavior (Y) through Self-Efficacy (Z), with b(YX2.M) = 0.6904 and significance 0.0003. This means that self-efficacy mediates the positive relationship between organizational commitment and innovative behavior. Teachers with high commitment and self-belief are more motivated to produce creative work. This result aligns with theories of organizational commitment that emphasize self-efficacy as a mediator for innovative outcomes [3], [8], [34].

**Hypothesis 10 (Effect of Psychological Contract on Innovative Behavior through Self-Efficacy)**

The findings demonstrate an indirect influence between the Psychological Contract (X3) and Innovative Behavior (Y) through Self-Efficacy (Z), with b(YX3.M) = 0.3078 and significance 0.0940. This suggests that a well-maintained psychological contract supported by self-efficacy contributes positively to teachers' innovative behavior. This is consistent with the conceptualization that self-efficacy mediates the effect of psychological constructs on work performance [35].

## 5. Conclusion

This study aimed to analyze the influence of psychological capital, organizational commitment, and psychological contract on teachers' innovative behavior, with self-efficacy as the mediating variable at Madrasah Tsanawiyah Muhammadiyah 09 Weru Paciran Lamongan.

The findings reveal that psychological capital and psychological contract have a significant positive effect on teachers' innovative behavior, both directly and indirectly through self-efficacy. This indicates that teachers who possess higher levels of confidence, optimism, and resilience are more capable of generating and implementing innovative ideas in the learning process.

Conversely, organizational commitment has no significant indirect effect on innovative behavior through self-efficacy. This suggests that while teachers' loyalty and attachment to the organization are strong, they do not necessarily translate into innovative work behavior unless supported by individual psychological resources.

The results of the validity and reliability tests show that all instrument items are valid ($r > 0.361$) and reliable (Cronbach's Alpha > 0.7), confirming the accuracy and consistency of the research instruments. Furthermore, the Sobel test results indicate that self-efficacy significantly mediates the relationship between psychological capital and psychological contract with innovative behavior, but not between organizational commitment and innovative behavior.

Overall, the study concludes that psychological factors play a crucial role in encouraging innovative behavior among teachers. Building positive psychological capital and maintaining mutual trust through a strong psychological contract can enhance teachers' self-efficacy, which in turn drives innovation in educational practices.

## References


[1] Sugiyono, Metode Penelitian Kuantitatif, Kualitatif dan R&D. Bandung: Alfabeta, 2019.

[2] A. A. Anwar Prabu Mangkunegara, Manajemen Sumber Daya Manusia Perusahaan. Bandung: PT Remaja Rosdakarya, 2017.

[3] S. P. Robbins and T. A. Judge, Organizational Behavior, 16th ed. Upper Saddle River, NJ: Pearson Education, 2015.

[4] I. Ghozali, Aplikasi Analisis Multivariate dengan Program IBM SPSS 25. Semarang: Badan Penerbit Universitas Diponegoro, 2018.

[5] J. F. Hair, W. C. Black, B. J. Babin, and R. E. Anderson, Multivariate Data Analysis, 7th ed. Upper Saddle River, NJ: Pearson Prentice Hall, 2010.

[6] F. Luthans, C. M. Youssef, and B. J. Avolio, Psychological Capital: Developing the Human Competitive Edge. Oxford, UK: Oxford University Press, 2007.

[7] B. J. Avolio and F. Luthans, The High Impact Leader: Moments Matter in Accelerating Authentic Leadership Development. New York: McGraw-Hill, 2006.

[8] J. P. Meyer and N. J. Allen, "A Three-Component Conceptualization of Organizational Commitment," Human Resource Management Review, vol. 1, no. 1, pp. 61–89, 1991.

[9] D. M. Rousseau, Psychological Contracts in Organizations: Understanding Written and Unwritten Agreements. Thousand Oaks, CA: Sage Publications, 1995.

[10] A. Bandura, Self-Efficacy: The Exercise of Control. New York, NY: W. H. Freeman and Company, 1997.

[11] S. P. Robbins and T. A. Judge, Perilaku Organisasi. Jakarta: Salemba Empat, 2017.

[12] D. H. Schunk, Learning Theories: An Educational Perspective, 6th ed. Boston, MA: Pearson Education, 2012.

[13] R. Kreitner and A. Kinicki, Organizational Behavior, 10th ed. New York: McGraw-Hill, 2013.

[14] J. M. Ivancevich, R. Konopaske, and M. T. Matteson, Organizational Behavior and Management, 10th ed. New York: McGraw-Hill Education, 2014.

[15] T. A. Judge and J. D. Kammeyer-Mueller, "Job Attitudes," Annual Review of Psychology, vol. 63, no. 1, pp. 341–367, 2012.

[16] J. L. Gibson, J. M. Ivancevich, J. H. Donnelly, and R. Konopaske, Organizations: Behavior, Structure, Processes, 14th ed. New York: McGraw-Hill Education, 2012.

[17] W. B. Schaufeli and A. B. Bakker, "Job Demands, Job Resources, and Their Relationship with Burnout and Engagement: A Multi-sample Study," Journal of Organizational Behavior, vol. 25, pp. 293–315, 2004.

[18] F. Luthans, C. M. Youssef, and B. J. Avolio, Psychological Capital: Developing the Human Competitive Edge. Oxford, UK: Oxford University Press, 2007.

[19] J. P. Meyer and N. J. Allen, "A Three-Component Conceptualization of Organizational Commitment," Human Resource Management Review, vol. 1, no. 1, pp. 61–89, 1991.

[20] D. M. Rousseau, Psychological Contracts in Organizations: Understanding Written and Unwritten Agreements. Thousand Oaks, CA: Sage Publications, 1995.

[21] A. Bandura, Self-Efficacy: The Exercise of Control. New York, NY: W. H. Freeman and Company, 1997.

[22] J. C. Nunnally and I. H. Bernstein, Psychometric Theory, 3rd ed. New York: McGraw-Hill, 1994.

[23] F. Luthans, Organizational Behavior: An Evidence-Based Approach, 12th ed. New York: McGraw-Hill Education, 2011.

[24] S. Santoso, Buku Latihan SPSS Statistik Parametrik. Jakarta: Elex Media Komputindo, 2000.

[25] S. Arikunto, Prosedur Penelitian: Suatu Pendekatan Praktik, 5th ed. Jakarta: Rineka Cipta, 2002.

[26] C. Hermina, "Discourse on the Relationship between the Influence of Psychological Capital on Teacher Innovation," Jurnal Pendidikan dan Psikologi, vol. 12, no. 1, pp. 45–54, 2024.

[27] N. W. Dahri and M. Aqil, "Organizational Culture, Job Satisfaction, and Organizational Commitment in Improving Innovative Behavior," Journal of Business and Management Research, vol. 5, no. 2, pp. 87–95, 2018.

[28] M. N. Abdi, "Leadership, Motivation, and Organizational Commitment in Influencing Innovative Behavior of Non-Profit Organization Managers," Journal of Leadership Studies, vol. 11, no. 4, pp. 33–40, 2023.

[29] V. A. Salim, "The Effect of Psychological Capital and Mindfulness on Work-Life Balance in Female Education Personnel," Indonesian Journal of Psychology and Education, vol. 8, no. 2, pp. 99–108, 2021.

[30] R. Hidayat, N. Sridana, and S. Sudirman, "The Effect of Job Satisfaction and Organizational Commitment on the Performance of State Vocational Teachers in Mataram City," Jurnal Pendidikan dan Manajemen, vol. 4, no. 1, pp. 55–66, 2016.

[31] R. P. Firdaus, D. Susita, and A. W. Handaru, "The Effect of Self-Efficacy and Quality of Work Life on Organizational Commitment in Telecommunications Companies," Journal of Management Science, vol. 10, no. 3, pp. 201–210, 2022.

[32] Noerchoidah, "Self-Efficacy and Innovative Behavior: The Role of Organizational Support," International Journal of Business and Management Research, vol. 9, no. 2, pp. 77–84, 2022.

[33] M. Zakiuddin, "The Effect of Motivation on Employee Performance with Self-Efficacy as a Mediating Variable: Study at PG. Kebon Agung Malang East Java," Journal of Business Research, vol. 7, no. 3, pp. 112–120, 2022.

[34] I. Rosyiana, Innovative Behavior in Review of Organizational Culture, Perceptions of Organizational Support, Innovation Competence and Psychological Contracts with Mediator Self-Efficacy in Hotel Sales Marketing Employees. Dissertation, Universitas Airlangga, 2020.

[35] W. Manurung, A. Bastian, and J. Wardi, "The Effect of Transformational Leadership and Affective Commitment on Employee Performance with Self-Efficacy as a Mediating Variable at the Siak District Health Office," Jurnal Manajemen dan Organisasi, vol. 13, no. 2, pp. 156–167, 2022.