

Effect of Teachers' Attitudes on Behavioral Intentions toward the New Curriculum Implementation: Mediating Role of Perceived Behavioral Control

Thae Hsu Khine

Abstract

In the education context, a small number of studies dealt with the effect of teachers' attitudes on behavioral intentions toward the curriculum change in its implementation stage by the mediating role of their perceived behavioral control. Hence, this study specifically focuses on understanding the effects of mediating variables on the relationship between primary teachers' attitudes and behavioral intentions toward implementing the new curriculum. The study investigated 627 primary teachers in Myanmar's government schools in the region of Naypyitaw Union Territory located in the central part of Myanmar, during the academic year 2021-2022 using teachers' attitudes questionnaire, behavioral intentions questionnaire, and perceived behavioral control questionnaire. Results revealed that teachers had positive attitudes and supportive behavioral intentions toward implementing the new curriculum. The findings also showed teachers' attitudes had a significant positive predictive effect on their behavioral intentions ($r = 0.5, p < 0.01$). Moreover, perceived behavioral control had a partially mediating effect between teachers' attitudes and behavioral intentions toward implementing the new curriculum. In the implementation stage of the new curriculum, the finding revealed the importance of teachers' perceptions of behavioral control in enhancing their actual new curriculum implementation behavior. It also provided additional empirical evidence in the educational context and also for the policy-makers in education.

Keywords: *Attitudes; Perceived behavioral control; New curriculum implementation behavior; Mediation effect; Primary teachers in Myanmar*

Article History:

Received: November 10, 2022

Accepted: November 30, 2022

Revised: November 29, 2022

Published online: December 1, 2022

Suggested Citation:

Thae Hsu Khine (2022). Effect of Teachers' Attitudes on Behavioral Intentions toward the New Curriculum Implementation: Mediating Role of Perceived Behavioral Control. *International Journal of Educational Management and Development Studies*, Volume 3 Issue 4, pp. 154 - 172. DOI: <https://doi.org/10.53378/352952>

About the author:

Master of Education Graduate. Doctoral Student, School of Education, Huazhong University of Science and Technology, Wuhan 430074, P.R. China.



1. Introduction

From Academic Year (AY) 2016-2017 onwards, the most significant education reform in Myanmar's basic education sector was the implementation of the new Kindergarten plus 12 (KG+12) Curriculum due to the system-wide change in the basic education system from the school structure of 5-4-2 to KG+12 (5-4-3). The adjustments and alterations to Myanmar's new basic education curriculum included the scope and sequence of the program, syllabi, textbooks, teachers' guides, teaching approaches, teachers' practices, teaching resources and materials, and also an assessment system. The implementation of the new curriculum makes Myanmar's teachers change the way they plan, teach and assess by adopting different curriculum materials, subject contents, teaching approaches, and assessments into their classroom practices (Ma et al., 2009). The central initiatives related to the new curriculum implementation are literally preoccupied with and implemented by teachers at the classroom level. Within the nature of top-down educational curriculum reforms like the new curriculum implementation in Myanmar, individual teachers are the foremost affected group by these changes, and they could become the opponents of those changes (Fullan, 2007). In reverse, they could become successful implementers in their classrooms which might result in effective educational changes, regardless of their nature (Broadfoot et al., 1994).

Many studies observed repeatedly that teachers are significant agents of curriculum change (Berman & McLaughlin, 1980; Fullan, 2007; McLaughlin, 2004). In any educational curriculum changes, teachers are the main implementers at school or classroom levels (Berman & McLaughlin, 1980; McLaughlin, 2004; Fullan, 2007; Ma et al., 2009; Lee et al., 2011). Curriculum change gives rise to cultural changes in classrooms or schools, changes in goals and skills, and also changes in teachers' philosophy or beliefs, behavior, and practices. Throughout the change process, school teachers' commitment and acceptance are not very strong and they are likely to revert to their pre-existing practices unless there is more support through addressing their skills, attitudes, beliefs, and level of commitment (Wedell, 2009). By addressing teachers' skills, attitudes, and level of commitment, more support for school teachers is one of the priorities for the improvement of Myanmar's basic education system (Hayden & Martin, 2013). The levels of teachers' attitudes toward Myanmar's new curriculum implementation are required to analyze when the old curriculum is changed to the new curriculum because they are the key implementers in curriculum reforming (Thura & Khaing, 2020). Teachers' attitudes and behavioral intentions

play a vital role in determining the success or failure of curriculum change (Lee, 2000; Waugh, 2000; Ma et al., 2009, Rashid & Pyng, 2019). In this sense, individual classroom teachers with positive attitudes and supportive behavioral intentions might be more likely to implement the curriculum changes with more commitment (Rashid & Pyng, 2019) as the degree of their implementation is determined by differences in their attitudes and behavioral intentions (Fleming 1992).

To date, there is still much uncertainty about the relationship between teachers' attitudes and behavioral intentions toward implementing the new curriculum. There is a growing body of literature that suggests teachers' positive attitudes do not translate into their implementation behaviors of the curriculum change (Ma et al., 2009; Yin, Lee & Jin, 2011; Lin et al., 2021). Further, research efforts focus more on when attitudes predict behaviors rather than whether attitudes predict behaviors (Cottrell, 2003). In this sense, the study considered that teachers' perceived behavioral control might influence their implementation behavior implicitly through the mediation of behavioral intentions and also directly (Ajzen, 2005, 1991; Bamberg & Möser, 2007). Therefore, the study aims to address this issue by investigating the relationships between teachers' attitudes, behavioral intentions, and perceived behavioral control through path analysis. As yet, in the education context, there is a current lack of research about the mediating role of perceived behavioral control between teachers' attitudes and behavioral intentions toward implementing the new curriculum. This study attempts to bridge this gap. To be specific, the purpose of the study is to understand the mediating effect of teachers' perceived behavioral control (i.e., the set of their perceived school support, perceived other support, perceived participation in decision-making, and their issues of concern) on the relationship between teachers' attitudes and behavioral intentions toward implementing the new curriculum in Myanmar's government schools. The following research questions guided the study:

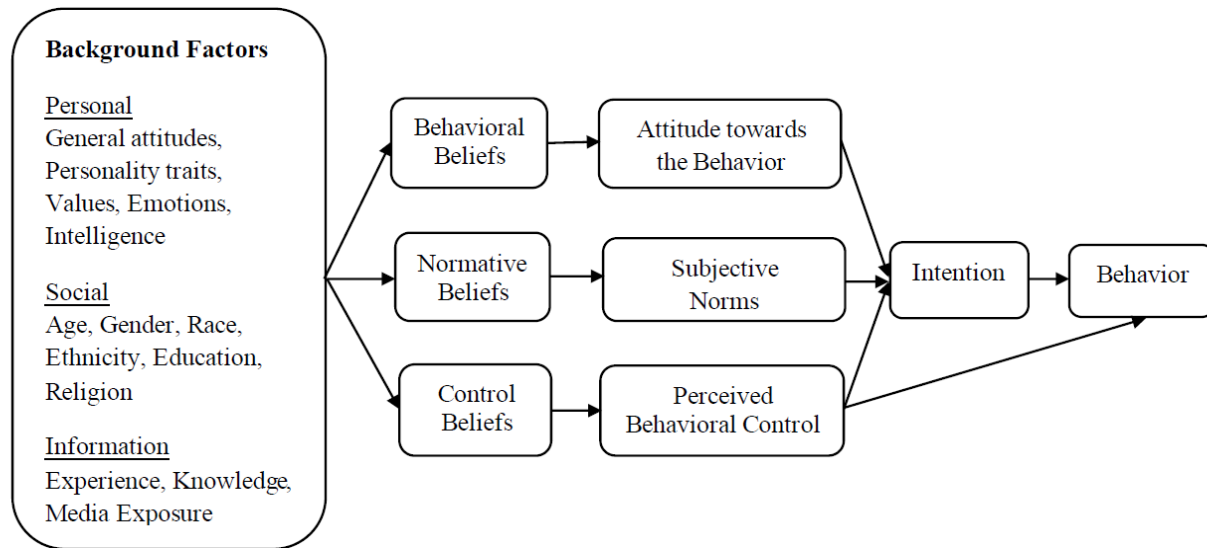
1. What relationships exist between primary teachers' attitudes, behavioral intentions, and their perceived behavioral control regarding the new curriculum implementation in the selected government schools in Myanmar?
2. Does primary teachers' perceived behavioral control mediate the relationship between attitudes and behavioral intentions toward implementing the new curriculum in the selected government schools in Myanmar?

2. Literature review

2.1. Theoretical Framework

Figure 1

The Theory of Planned Behavior (Ajzen, 2005)



The theory of planned behavior is one of the best-supported social psychology theories to predict human behavior and also a powerful approach to understanding better and explaining human behavior (Sommer, 2011). Due to the original theory's limitations in dealing with behaviors affected by external factors and objective circumstances, the theory of planned behavior is the solution and extension of the theory of reasoned action by addressing people's incomplete volitional control (Ajzen, 2005, 1991, 1985). In line with the basic assumptions of the theory of planned behavior, a person's intention to perform or not to perform a behavior was most likely to determine that action (Ajzen, 2005). According to the central premise of the theory of planned behavior, three basic determinants of predicting intentions (and individual behavior) were the individual's attitudes toward the behavior, subjective norms, and perceived behavioral control (Ajzen, 2005, 1991; Rsid and Pyng, 2019; Smith et al., 2007).

Attitudes toward behavior, unlike general attitudes toward institutions or people, or objects, refer to the degree to which a person has a favorable or unfavorable evaluation or appraisal of performing a particular behavior of interest (Ajzen, 2005, 1991). The second major determinant of intentions, subjective norms, refers to the perceived social pressure to perform or not to perform the behavior, for instance, the pressure from peers or coworkers in agreeing or disagreeing with him/her to take a particular act (Ajzen, 2005, 1991; Zhang, 2018). The final major predictor of

intentions, perceived behavioral control, is the sense of self-efficacy or ability to perform the behavior of interest or the perceived ease or difficulty of performing the behavior with the reflection of past experience as well as anticipated impediments and obstacles (Ajzen, 2005, 1991, 1985). Moreover, the theory of planned behavior suggested that a multitude of background variables might influence the beliefs people held and their intentions and actions.

2.2. Mediating Role of Perceived Behavioral Control on the Relationship between Attitudes and Behavioral Intentions

The study of Thorsen-Spano (1996) showed a strong positive correlation between teachers' attitudes and curriculum implementation. Ajzen (2005) also showed there is a strong positive correlation between people's behavioral intentions and their actual behavior. According to the model of teacher receptivity theory by Yin and Lee (2008), the underlying factors of the perceived behavioral controls were defined as school support for the curriculum change, other support, participation in school decision-making, and issues of concerns to be alleviated. Further, many studies proved that teachers' behavioral intentions toward implementing the new curriculum could be predicted by their perceptions of school support (Waugh & Godfrey, 1993; Lee, 2000; Lee et al., 2011), other support (Lee, 2000), participation in decision-making (Waugh & Godfrey, 1993; Moroz, 1999), and issues of concern (Lee, 2000; Shapiro, 2018).

The findings of Lin et al. (2021) on the perceived behavioral control as a mediator between attitudes and intentions toward marine responsible environment behavior (M-REB) suggested that perceived behavioral control was the mediator between attitudes and intentions toward M-REB. Meanwhile, Desombre et al. (2019) assessed French teachers' general attitude toward inclusion with the consideration of the indirect effect of teacher efficacy and found that the general teachers' low sense of efficacy acted as a mediator and exhibited less favorable attitudes toward inclusive education than the special teachers. Using the theory of planned behavior and reasoned action, the findings of Paul et al. (2016) about predicting green product consumption also showed indirect effect of perceived behavioral control on the relationship between environmental concern and purchase intention. Based on the theory and previous related studies, particularly in the educational context of curriculum change, the researcher conducted the present study about the mediating role of teachers' perceived behavioral control on the relationship between their attitudes and behavioral intentions toward implementing the new curriculum to know when attitudes predict actual implementation behaviors rather than whether attitudes predict behaviors.

2.3. Basic Education Curriculum Change in Myanmar

When the new democratic government was formed in 2016, education reform gained momentum as it was being a national priority in Myanmar. In 2012, President Thein Sein developed a 10-point education policy and a 20-year Long-term Plan (2011-2031) called the Basic Education Sector National Education Promotion in line with the previous 30-year Basic Education Plan (Lall, 2020). The Ministry of Education (MOE) conducted the Comprehensive Education Sector Review (CESR) in four stages intending to know the challenges and gaps in the present education system (Soe et al., 2017; Lall, 2020). The CESR focused on subsequent areas such as policy, legislation, management and finance, basic education, teacher education, non-formal education, technical vocational education and training (TVET), higher education, and information and communication technology (ICT) (UNESCO, 2014; Soe et al., 2017). The major achievement of the CESR initiatives was the National Education Law (NEL) in 2014 and the amendment of the NEL in 2015 (Soe et al., 2017). Further, the significant output of CESR was the sector-wide National Education Strategic Plan (NESP) for the period 2016-2021.

Myanmar's basic education initiatives in six sub-sectors were included in six transformation shifts: preschool and kindergarten education; basic education access, quality, and inclusion; basic education curriculum; student assessment and examinations; teacher education and management; and alternative education. To develop all school children's knowledge, skills, attitudes, and competencies that might be relevant to their lives and to the socio-economic development needs of 21st century Myanmar, a systematic change of curriculum reform was aimed to bring through the following strategies: (a) redesigning the basic education curriculum that emphasizes 21st-century skills, soft skills and higher-order thinking skills, (b) building the professional capacity of Curriculum Development Teams, and (c) implementing the new curriculum through the strengthened curriculum management, dissemination, and monitoring and evaluation system (Ministry of Education, 2016).

Basic education curriculum change for the new basic education system is one of the most significant education reforms in recent times. The basic education curriculum was upgraded with some actions: once in Academic Year (AY) 1998-1999; and a second time in AY 2008-2009, through only just adding some school activities and some subjects related to general studies, aesthetic education, physical education, environmental education and so on. As a result, major problems such as teacher-fronted 'chalk and talk' teaching and rote-learning, the exam-based system, the curriculum's lack of clearly defined standards, better descriptions of learning outcomes

and competencies, the curriculum content demanding 21st-century student outcomes, and so on, still exist in Myanmar's basic education curriculum (Khine et al., 2022). According to the NEL, Myanmar's basic education system was restructured from an 11-year system (5-4-2) (grades 1-5 for the primary level, grades 6-9 for the lower secondary level, and grades 10-11 for the upper secondary level) to the KG+12 (5-4-3) system (kindergarten plus 12 years) to align with ASEAN members (Lall, 2020). The KG+12 system included kindergarten, 5 years for the primary level, 4 years for the lower secondary level, and 3 years for the upper secondary level. According to the NESP, due to the alteration of school structure in the basic education system, basic education curriculum reform became one of the transformational shifts in basic education sector reforms. The MOE issued Myanmar's basic education curriculum implementation schedule that was approved by the National Curriculum Committee (Ministry of Education, 2016). Concerning the schedule, each of the new curricula for kindergarten in AY 2016-2017, for Grade 1 in AY 2017-2018, Grade 2 in AY 2018-2019, Grade 3 and 6 in AY 2019-2020, and Grade 4, 7 and 10 in AY 2020-2021, Grades 5, 8 and 11 in AY 2021-2022 and Grades 9 and 12 in AY 2022-2023 have been implemented. Accordingly, from 2015 on, new textbooks and teacher's guides for the specific grade levels have been introduced to all basic education schools (including all government schools, monastic schools, and private schools) in each specific year.

One of the main reforms to Myanmar's basic education was the changes to the curriculum and textbook content (Lall, 2020). The new primary education curriculum comprised nine subjects such as Myanmar, English, Mathematics, Science, Social Studies, Morality and Civics, Life Skills, Physical Education, and Arts (performing arts and visual arts) (JICA, 2017). The new textbooks are colorful and full of pictures designed to stimulate students' interest in learning. They are integrated with five soft skills essential for students' life in terms of the 5Cs (collaboration, communication, critical thinking and problem solving, creativity and innovation, and citizenship). The detailed teachers' guides for each subject were developed to assist teachers to abandon the use of rote learning. The reforms include overhauling not only the curriculum and assessment system but also training in-service teachers in a new pedagogy to deliver the new curriculum and prepare students for the new assessment system (Lall, 2020). In this regard, a series of cascade training courses were conducted from the central level to the regional/state levels, district levels, and township levels. Following this, the nationwide in-service teacher training for each specific grade level was conducted and implemented in each specific year.

3. Methodology

The aim of this study is to examine the mediating effect of perceived behavioral control (i.e., the set of perceived school support, perceived other support, perceived participation in decision-making, and issues of concern) on the relationship between primary teachers' attitudes and behavioral intentions toward implementing the new curriculum. This study employed the survey research design to measure teachers' attitudes toward the new curriculum implementation, their behavioral intentions, and their perceived behavioral control.

The questionnaire used in this study contained 41 items, on a 7-point Likert scale, which were adapted from the validated "Receptivity to Change" instruments of Waugh and Godfrey (1993), Lee (2000), and Shapiro (2018). The questionnaire contained the six variables such as teachers' attitudes, behavioral intentions, perceived school support, perceived other support, perceived participation in decision-making, and issues of concern.

For high validity, the instrument items were adapted from previous related research done successfully by Waugh and Godfrey (1993), Lee (2000), and Shapiro (2018). Further, for the content validity of the research questionnaire, the researcher approached three experts who had special knowledge and experience in the field of study. The survey items in English were translated into the Myanmar language. Based on expert judgment and suggestions, some edits and rearrangements were made. After that, a pilot study was conducted with 47 primary teachers in four government schools (three Basic Education High Schools and one Basic Education Primary School) located in one township of the Naypyitaw region, Myanmar. Data collected from the pilot study were analyzed using Statistical Package for Social Sciences (SPSS). A very common measure of reliability, Cronbach's alpha, was used to assess the internal consistency reliability of the items on the survey instrument. The Cronbach's alpha value of the survey instrument as a whole proved to have excellent reliability (0.91, $\alpha > 0.9$).

To obtain the representative sample, the final study was conducted in Naypyitaw Union Territory located in the central part of Myanmar. Using the cluster sampling method, townships were grouped into two clusters: District A with four townships, and District B with four townships. Among them, two townships were randomly selected from each cluster and then a total of four townships were selected from two clusters in Naypyitaw Region. Several processes for data collection, such as requesting admission from the Department of Basic Education, the District Education Offices, and four Township Education Offices, printing the questionnaires, and distributing them to the surveyed teachers through the help of education officers and school

principals, were conducted. The survey questionnaires were distributed to 900 primary teachers (only kindergarten, grades 1, 2, and 3 teachers) from government schools in four townships. A total of 627 teachers responded and the response rate was 70%.

The principal component analysis was conducted for the factorial validity of the survey questionnaire with a sample size of 627. The IBM SPSS Statistic 23 software was used to analyze the data. According to the Kaiser-Meyer-Olkin (KMO) and Bartlett's test for teachers' attitudes questionnaire, the KMO value was 0.94, and Bartlett's test result was significant ($p < 0.001$) proving the reasonable basis for factorization. The results of the principal component factor loading analysis with varimax rotation and kaiser normalization indicated that the cumulative total variation of interpretation reached 73.17%. Each item had a large load on the corresponding factor, ranging from 0.79 to 0.89. For the behavioral intentions questionnaire, the KMO value was 0.70 and the Bartlett test result was significant ($p < 0.001$). The factor accounted for 43.42% of the variance and each item had a large load ranging from 0.41 to 0.84. For the perceived behavioral control questionnaire, the KMO value was 0.90 and the Bartlett test result was significant ($p < 0.001$). Of the total variance explained, the first factor (School Support) accounted for 7.61 % of the variance, the second factor (Other Support) accounted for 4.98 %, the third factor (Participation in Decision-making) accounted for 18.10 %, and the fourth factor (Issues of Concern) accounted for 33.78 %. each item had a large load ranging from 0.527 to 0.866. The value of Cronbach's alpha of the survey instrument for the final survey as a whole proved to have acceptable reliability (0.71, $\alpha > 0.7$). The reliabilities for each subscale within the instrument of the final survey are reported in table 1.

Table 1

Internal Consistency/ Reliability of Items (n = 627)

| <i>Subscale</i> | <i>n Items per Scale</i> | <i>Reliability (Cronbach's α)</i> |
|----------------------------------|--------------------------|---|
| Attitudes | 10 | .96 |
| Behavior Intentions | 6 | .70 |
| School Support | 8 | .90 |
| Other Support | 4 | .79 |
| Participation in Decision-Making | 6 | .89 |
| Issues of Concern | 7 | .91 |
| Total items | 41 | .71 |

The quantitative data obtained were analyzed with descriptive statistics (mean and standard deviation), inferential statistics (Pearson product-moment correlations), and statistical mediation by using SPSS. The descriptive statistics were conducted to investigate teachers' attitudes toward the new curriculum implementation, behavioral intentions, and perceived behavioral control. Furthermore, the inferential statistics were assessed to know if there were significant relationships among the variables. Model 4 of the PROCESS macro for the SPSS was used to conduct the statistical multiple mediation analysis to determine if perceived behavioral control mediates the relationship between teachers' attitudes and behavioral intentions toward implementing the new curriculum. Based on the theoretical literature and the empirical evidence, the variables for the multiple mediation analysis were selected. Furthermore, it was assumed statistically that mediation occurs if the set of mediating variables reduces the magnitude of the relationship between two other variables.

4. Findings and Discussion

Table 2

Descriptive Statistics (n = 627)

| Variables | Mean | SD |
|----------------------------------|-------------|-----------|
| Attitude | 5.62 | .75 |
| Behavioral Intentions | 5.18 | .62 |
| School Support | 5.25 | .60 |
| Other Support | 4.81 | .74 |
| Participation in Decision-Making | 5.24 | .65 |
| Issues of Concern | 4.13 | 1.01 |

According to table 2, the mean scores and standard deviations of overall teachers' attitudes and behavioral intentions scales are $M = 5.62$, $SD = .75$, and $M = 5.18$, $SD = .62$, respectively. The overall average scores for both attitudes and behavioral intentions toward implementing the new curriculum are greater than the scale-neutral score of 4.0. The surveyed teachers showed not only positive attitudes but also supportive behavioral intentions toward implementing the new curriculum. Further, teachers showed favorable perceptions of school support ($M = 5.25$, $SD = 0.60$), other support ($M = 4.81$, $SD = 0.74$), and participation in decision-making ($M = 5.24$, $SD = 0.65$). But according to the mean score and standard deviation of their issues of concern ($M = 4.13$,

$SD = 1.01$), they had high concerns about the issues associated with the new curriculum implementation at schools.

Table 3

Correlation of Variables (n = 627)

| | Attitudes | Behavioral Intentions | School Support | Other Support | Participation in Decision-Making | Issues of Concern |
|----------------------------------|-----------|-----------------------|----------------|---------------|----------------------------------|-------------------|
| Attitudes | -- | .50** | .44** | .15** | .49** | -.21** |
| Behavioral Intentions | -- | -- | .44** | .16** | .55** | -.28** |
| School Support | -- | -- | -- | .50** | .69** | -.13** |
| Other Support | -- | -- | -- | -- | .37** | .08* |
| Participation in Decision-making | -- | -- | -- | -- | -- | -.21** |
| Issues of Concern | -- | -- | -- | -- | -- | -- |

Note: * $p < .05$, ** $p < .01$

According to the results in table 3, the correlation among the variables reached a significant level ($p < 0.05$). Among them, teachers' behavioral intentions toward implementing the new curriculum were significantly positively correlated with their attitudes ($r = 0.5, p < 0.01$), perceived school support ($r = 0.44, p < 0.01$), perceived other support ($r = 0.16, p < 0.01$), and participation in decision-making ($r = 0.55, p < 0.01$). And their behavioral intentions were significantly negatively correlated with their issues of concern ($r = -0.28, p < 0.01$). With the highest correlation value, the variable of perceived participation in decision-making showed a stronger influence on teachers' attitudes and behavioral intentions toward implementing the new curriculum. According to the high mean score of participation in decision-making ($M = 5.24$), teachers in the study seem to have good coordination with other teachers at schools and satisfaction in making decisions with regard to their assigned subject matter, teaching methods, teaching aids, and classroom assessment. In this respect, teachers in the study seem to reveal their positive attitudes and supportive behavioral intentions toward implementing the new curriculum. Further, teachers in this study showed high concerns about the issues associated with the new curriculum implementation ($M = 4.13$). They were concerned most about their insufficient subject matter knowledge in specific subjects. They were also concerned about classroom management issues with regard to teaching resources and classroom disciplines, the limited time-bound, and also cooperation and

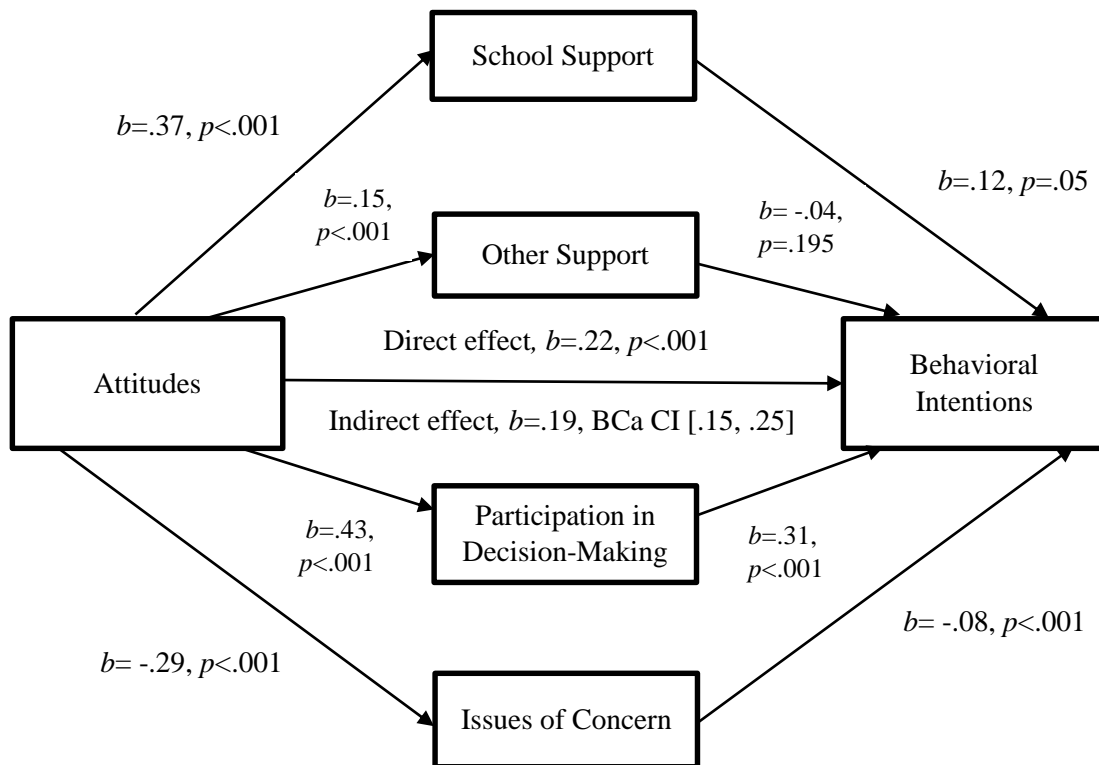
communication among principals, teachers, and parents. Despite the weak relationship between teachers' attitudes and their issues of concern, and between their behavioral intentions and their issues of concern, the finding of the study implied that alleviation of teachers' concerns might enhance teachers' attitudes and behavioral intentions toward implementing the new curriculum.

4.1. Mediating Effect Test

Although the study examined the relationships between variables to understand how they are causally related, just the correlation between them is not sufficient and it is necessary to explain how or by what means a causal effect occurs (Preacher & Hayes, 2008). In this regard, the study tried to focus on when teachers' attitudes predict their curriculum implementation behaviors rather than whether their attitudes predict their curriculum implementation behaviors such as other research efforts focused more on it (Cottrell, 2003; Lin et al., 2021). Model 4 of the PROCESS macro for the SPSS was used to perform the multiple mediating effect test.

Figure 2

Multiple Mediating Effect of Perceived Behavioral Control on the relationship between Teachers' Attitudes and Behavioral Intentions



According to figure 2, the total effect of teachers' attitudes on their behavioral intentions was $b = 0.41$, $p < 0.001$, and the direct effect was $b = 0.22$, $p < 0.001$, respectively. Results indicated that the effects of teachers' attitudes on their behavioral intentions were only partially mediated by their perceived behavioral control (i.e., the set of perceived school support, perceived other support, perceived participation in decision-making, and issues of concern). Meanwhile, the total indirect effect of teachers' attitudes on their behavioral intentions mediated by their perceived behavioral control was 0.20, and a 95% confidence interval ranging from 0.15 to 0.25. Because this range did not include zero, the set of variables such as school support, other support, participation in decision-making, and issues of concern did statistically and significantly mediate the relationship between teachers' attitudes and their behavioral intentions, $b = 0.20$, 95% BCa CI [0.15, 0.25]. The results affirm the consistent interpretation that alleviating the issues of concern, teachers' favorable attitudes led to their favorable perceptions of school support, other support, and participation in decision-making, which in turn led to their supportive behavioral intentions toward implementing the new curriculum.

Table 4

Regression Analysis of the Relationship between Variables in the Model (n = 627)

| Model | Regression Equation | | Significant Regression Coefficient | | | | |
|-------|----------------------------------|----------------------------------|------------------------------------|-----------|------|----------|-------|
| | Outcome Variable | Predictive Variable | R^2 | F | b | t | p |
| 1 | Behavioral Intentions | Attitudes | .25 | 154.94*** | .41 | 12.44*** | <.001 |
| 2 | School Support | Attitudes | .21 | 102.56*** | .37 | 10.13*** | <.001 |
| 3 | Other Support | Attitudes | .02 | 12.57*** | .15 | 3.54*** | <.001 |
| 4 | Participation in Decision-making | Attitudes | .24 | 132.65*** | .43 | 11.52*** | <.001 |
| 5 | Issues of Concern | Attitudes | .05 | 22.79*** | -.29 | -4.77*** | <.001 |
| 6 | Behavioral Intentions | Attitudes | .39 | 71.77 | .22 | 5.98*** | <.001 |
| | | School Support | | | .12 | 1.98* | <.05 |
| | | Other Support | | | -.04 | -1.30 | .20 |
| | | Participation in Decision-making | | | .31 | 6.06*** | <.001 |
| | | Issues of Concern | | | -.08 | -3.55*** | <.001 |

Note: *** $p < 0.001$, ** $p < 0.01$, * $p < 0.05$.

According to table 5, an examination of the specific indirect effects indicated that only participation in decision-making and issues of concern significantly mediated the effects of

attitudes on behavioral intentions since their specific indirect effects were significantly different from zero (their 95% CI did not contain zero). Examination of the pairwise contrasts of indirect effects showed that the specific indirect effect through teachers' perceived participation in decision-making was the highest among the specific indirect effects through school support, other support, and issues of concern, with 95% BCa CI of -0.20 to -0.02, -0.20 to -0.10, and 0.06 to 0.20, respectively.

Table 5

Mediation of the Effect of Teachers' Attitudes on Behavioral Intentions through Perceived Behavioral Control
($n = 627$)

| | Effect | SE | Bootstrapping | |
|--------------------------------------|--------|-------|---------------|------|
| | | | BCa 95% CI | |
| | Lower | Upper | | |
| Indirect Effects | | | | |
| School Support | .04 | .02 | -.001 | .09 |
| Other Support | -.01 | .01 | -.02 | .002 |
| Participation in Decision-making | .13 | .03 | .10 | .20 |
| Issues of Concern | .02 | .01 | .01 | .04 |
| TOTAL | .19 | .03 | .14 | .25 |
| Contrasts | | | | |
| School Support vs Other Support | .05 | .02 | -.01 | .10 |
| School Support vs Decision-making | -.10 | .04 | -.20 | -.02 |
| School Support vs Issues of Concern | .02 | .02 | -.03 | .07 |
| Other Support vs Decision-making | -.14 | .03 | -.20 | -.10 |
| Other Support vs Issues of Concern | -.03 | .01 | -.05 | -.01 |
| Decision-Making vs Issues of Concern | .11 | .03 | .06 | .20 |

Note. BCa, bias-corrected and accelerated; 1,000 bootstrap samples

In this study, the effect of teachers' attitudes on behavioral intentions decreased substantially when the set of variables (i.e., perceived school support, perceived other support, perceived participation in decision-making, and issues of concern) is entered simultaneously with attitudes as a predictor of behavioral intentions. It was concluded that the set of primary teachers' perceived behavioral control mediates the effect of teachers' attitudes on behavioral intentions toward implementing the new curriculum. The study supports Lin et al. (2021) that perceived behavioral control had a significant mediation effect on the relationship between attitudes and intentions toward responsible marine environmental behavior, Desombre et al. (2019) that teachers' sense of efficacy acted as a mediator and showed less favorable attitudes towards

inclusive education than special teachers, and Paul et al. (2015) that environment concern had an indirect effect on purchase intention through perceived behavioral controls. The results of this study showed that primary teachers' attitudes toward implementing the new curriculum indirectly improve their behavioral intentions through facilitating their perceived school support, perceived other support, perceived participation in decision-making, and alleviating their issues of concern. The results also implied that teachers' positive attitudes toward implementing the new curriculum are an important resource for enhancing their actual implementation behavior of the new curriculum.

On the one hand, teachers' attitudes could reduce their resistance toward implementing the curriculum change by improving their perceptions of school support, other support, and participation in decision-making and also alleviating their issues of concern. Similarly, their attitudes could indirectly enhance their behavioral intentions toward implementing the new curriculum. In this sense, the results implied that teachers' attitudes influence their implementation behavior, and suggested that the relationship between their attitudes and their implementation might decline due to the mediation effect of perceived behavioral control. Moreover, there is potential benefit of reconsidering the indirect effect of teachers' attitudes on behavioral intentions toward implementing the new curriculum by their perceived behavioral control. The results provided empirical evidence for future policy-makers in the implementation of any educational change. In addition, there were additional statistical evidence in the educational context that teachers' attitudes toward implementing the new curriculum could translate into their actual implementation behavior through the mediating effect of perceived behavioral control (i.e., the set of perceived school support, other support, participation in decision-making, and issues of concern).

5. Conclusion

This study investigated the relationship between primary teachers' attitudes, behavioral intentions, and perceived behavioral control in the context of educational curriculum change. The study also completed a multiple mediation test to determine if teachers' attitudes influence behavioral intentions via an indirect effect of perceived behavioral control. Primary teachers in the study showed positive attitudes and supportive behavioral intentions toward implementing the new curriculum. Teachers strongly believed that the new curriculum implementation is highly necessary indeed while it is still ineffective, unsatisfactory, or complicated to some extent. Further, they showed their supportive behavioral intentions toward implementing the new curriculum while

some teachers intended to oppose it or resist it due to inadequate support, insufficient time, and insufficient subject matter knowledge. The study revealed the significant relationships between attitudes, behavioral intentions, and perceived behavioral control (i.e., perceived school support, other support, participation in decision-making, and issues of concern). These results are consistent with the previous studies about curriculum change in the education context (Waugh & Godfrey, 1993; Moroz, 1999; Lee, 2000; Lee et al., 2011; Ha et al., 2010; Shapiro, 2018).

One of the main endeavors within the curriculum change is to clarify the mechanism between teachers' attitudes toward implementing the new curriculum and their implementation behaviors. The findings of the study showed that perceived behavioral control (i.e., the set of teachers' perceptions of school support, other support, participation in decision-making, and issues of concern) plays a significant mediation between their attitudes and behavioral intentions toward the new curriculum implementation in the educational context. The findings implied that teachers' attitudes influence their actual implementation behavior of the new curriculum via the indirect effect of perceived behavioral control. The study provided additional statistical evidence about the reason why teachers' positive attitudes do not translate into their actual implementation behavior might be due to the levels of their perceived behavioral control. Therefore, the enhancement of perceived behavioral control is crucial to cultivating individual teachers' actual new curriculum implementation behavior rather than treating attitudes as the sole predictor.

References

- Ajzen, I. (1985). *From intentions to actions: A theory of planned behavior*. Berlin: Springer.
- Ajzen, I. (1991). The theory of planned behavior. *Organizational Behavior and Human Decision Processes*, 50, 179-211.
- Ajzen, I. (2005). *Attitudes, personality and behavior* (2nd ed.). Milton-Keynes: Open University Press/McGraw-Hill.
- Bamberg, S., & Möser, G. (2007). Twenty years after Hines, Hungerford, and Tomera: A new meta-analysis of psycho-social determinants of pro-environmental behavior. *Journal of Environmental Psychology*, 27, 14–25.
- Berman, P., & McLaughlin, M. W. (1980). Factors affecting the processes of change. In M. M. Milstein (ed.) *Schools, Conflict, and Change*. New York: Teachers College Press.

- Broadfoot, P., Osborn, M., Planel, C. & Pollard, A. (1994). Teacher and educational reforms: teachers' response to policy changes in England and France. *Education Resources Information Centre*, ED380463.
- Cottrell, S.P. (2003). Influence of socio-demographics and environmental attitudes on general responsible environmental behavior among recreational boaters. *Environment and Behavior*, 35(3), 347–375. <https://doi.org/10.1177/0013916503035003003>.
- Desombre, C., Lamotte, M., & Jury, M. (2018). French teachers' general attitude toward inclusion: The indirect effect of teacher efficacy. *Educational Psychology*, 39, 38–50. <https://doi.org/10.1080/01443410.2018.1472219>.
- Fleming, M. (1992). *Teacher receptivity to teaching models*. Doctoral Dissertation, University of Arizona. Research Direct.
- Fullan, M. (Ed.). (2007). *The new meaning of educational change*. New York: Teachers College Press.
- Ha, A. S. C, Sum, R. K. W., Chan, D. W. K., O'Sullivan, M., & Pang, B. O. H. (2010). Effects of a professional development program on teacher receptivity and curriculum change in Hong Kong Physical Education. *Educational Research Journal*, Vol. 25, No. 1, pp. 47-80.
- Hayden, M. & Martin, R. (2013). Recovery of the education system in Myanmar. *Journal of International and Comparative Education*, Volume (2), Issue (2).
- Japan International Cooperation Agency (JICA) (2017). 'Introduction of New G1 Curriculum and Textbooks'. Press Release, JICA. <https://www.jica.go.jp/myanmar/english/office/topics/press170526.html>.
- Khine, T. H., Ping, L. T., & Jing, S. (2022). Teachers' receptivity toward system-wide curriculum change in the implementation stage. *International Journal of Humanities and Social Science*, 12(2), 1-11.
- Lall, M. (2020). *Myanmar's Education Reforms: A pathway to social justice?* London: UCL Press. <https://doi.org/10.14324/111.9781787353695>.
- Lee, J. C. (2000). Teacher receptivity to curriculum change in the implementation stage: The case of environmental education in Hong Kong. *Journal of Curriculum Studies*, 32, 95-115. DOI: 10.1080/002202700182871.
- Lee, J. C., Yin, H., Zhang, Z., & Jin, Y. (2011). Teacher empowerment and receptivity in curriculum reform in China. *Chinese Education & Society*, 44,64-81. <http://doi.org/10.2753/CED1061-1932440404>.

- Lin, Y. C., Liu, G. Y., Chang, C. Y., Lin, C. F., Huang, C. Y., Chen, L. W., & Yeh, T. K. (2021). Perceived behavioral control as a mediator between attitudes and intentions toward marine responsible environmental behavior. *Water*, 13, 580. <https://doi.org/10.3390/w13050580>.
- Ma, Y. P., Yin, H. B., Tang, L. F., & Liu, L. Y. (2009). Teacher receptivity to system-wide curriculum change in the initiation stage: a Chinese perspective. *Asia Pacific Education Review*, 10(3), 423-432. DOI:10.1007/s12564-009-9029-9.
- McLaughlin, M. W. (2004). Implementation as mutual adaptation: Change in classroom organization. In D. J. Flinders & S. J. Thornton (Eds.), *The curriculum studies reader* (pp. 171-182). New York: RoutledgeFalmer.
- Ministry of Education (2016). *National Education Strategic Plan- NESP (2016-21)*. The Government of the Republic of the Union of Myanmar.
- Moroz, R. (1999). *Teacher receptivity to system-wide change: The introduction of student outcome statements in secondary schools in Western Australia* [Master Thesis, Edith Cowan University]. Research Direct.
- Paul, J., Modi, A., & Patel, J. (2015). Predicting green product consumption using theory of planned behavior and reasoned action. *Journal of Retailing and Consumer Services*, 29, 123–134. <https://doi.org/10.1016/j.jretconser.2015.11.006>.
- Rashid, A. M. & Pyng, H. S. (2019). Agricultural Integrated Living Skills teachers' receptivity to assessment for learning practices in Malaysian Secondary Schools. *International Journal of Humanities and Social Science*, Vol.9(1), pp. 114-120. DOI:10.30845/ijhss.v9n1p13.
- Shapiro, L. J. (2018). *High school science teachers' receptivity to the next generation science standards: an examination of discipline specific factors* [Doctoral Dissertation, Northeastern University]. Research Direct.
- Smith, J. R., Manstead, A. S. R., Terry, D. J., & Louis, W. R. (2007). Interaction effects in the theory of planned behavior: The interplay of self-identity and past behavior. *Journal of Applied Social Psychology*, Vol (37), No(11), pp.2726-2750.
- Soe, M. Z., Swe, A. M., Aye, N. K. M. & Mon, N. H. (2017). Reform of the education system: Case study of Myanmar. Regional Research Paper. Parliamentary Institute of Cambodia.
- Sommer, L. (2011). The theory of planned behavior and the impact of past behavior. *International Business & Economics Research Journal*, Vol(10), No.1, pp.91-110.
- Thorsen-Spano, L. (1996). A school conflict resolution program: Relationships among teacher attitude, program implementation, and job satisfaction. *The School Counselor*, 44(1), 19-27. <http://www.jstor.org/stable/23897976>.

- Thura, M., & Khaing, N. N. (2020). Primary teachers' attitudes towards new curriculum. *J. Myanmar Acad. Arts Sci.* 2020 Vol. XVIII. No.9B
- UNESCO. (2014). Educational for All 2015 National Review Report: Myanmar.
- Waugh, R. F & Godfrey, J. (1993). Teacher receptivity to system-wide change in the implementation stage. *British Educational Research Journal*, 19, 565-578. DOI:10.1080/0141192930190509.
- Waugh, R. F. (2000). Towards a model of teacher receptivity to planned system-wide educational change in a centrally controlled system. *Journal of Educational Administration*, 38(4), 350-367. <https://doi.org/10.1108/09578230010373615>.
- Wedell, M. (2009). *Planning for educational change: Putting people and their contexts first*. London: Continuum.
- Yin, H. B., & Lee, C. K. (2008), *Curriculum Change: Theory and Practice*. Taipei: Higher Education Publishing [Chinese]
- Yin, H. B., Lee, J. C. K., & Jin, Y. L. (2011). Teacher receptivity to curriculum reform and the need for trust: An exploratory study from Southwest China. *The Asia-Pacific Education Researcher*, 20(1), 35-47.
- Zhang, K. (2018). Theory of planned behavior: Origins, development and future direction. *International Journal of Humanities and Social Science Invention (IJHSSI)*, Vol (7), Issue 05, pp.76-83.