



Article Teachers' Turnover Intentions in View of Implementing a Flexible Learning System: An Extended Theory of Planned Behavior

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Abstract: Recent reports associate teachers' turnover intentions as a response to disruptions and transition of the teaching-learning process (e.g., flexible learning) due to the COVID-19 pandemic. This study explores the antecedents of teachers' intention to teach in a flexible learning system (FLS) and their turnover intentions via an extended theory of planned behavior (TPB). Using a crosssectional survey, 417 valid responses were analyzed to model this phenomenon, with self-efficacy and digital nativity as antecedent variables and job satisfaction and organizational commitment as predictors of teachers' attitudes. We also examined whether the intention to teach in FLS is moderated by age. Results from Partial Least Squares-Structural Equation Modeling (PLS-SEM) generate insights from the 12 hypothesized paths of the proposed model. We uncover salient findings such as (1) the extended TPB model explains 61% of the overall variations of intention to teach in FLS, (2) attitude is positively explained by job satisfaction and organizational commitment, (3) digital nativity and self-efficacy positively influence the attitude, subjective norm, and perceived behavioral control in the context of teaching in FLS, with perceived behavioral control as the strongest predictor of teaching intention, (4) the negative relationship between intention to teach in FLS and turnover intention of teachers, and (5) age has no moderating effect on the teachers' intention to teach in FLS. Some practical insights and future research works are outlined in light of these findings.

Keywords: turnover intention; flexible learning; theory of planned behavior; self-efficacy; digital nativity

1. Introduction

The United Nations Sustainable Development Goals, particularly on quality education (Goal 4), aspire to equal access for all to quality tertiary education. Such access is intertwined by the concerted efforts of both teachers and students in a fostering and safe environment. However, the ongoing COVID-19 pandemic has remarkably disrupted people's way of life, including the educational sector, impacting over 60% of the world's student population [1], aside from its adverse impacts on the education workforce. Educational organizations swiftly established alternative learning modalities that limited in-person classes from the basic to the tertiary levels. Higher education institutions (HEIs) adopt a flexible learning system (FLS) to avoid and reduce the dangers of infections in the academic community. Several studies (e.g., [2]) espoused the practicality of the FLS amid the COVID-19 pandemic. Flexible learning affords several options for personalizing the learning



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Copyright: © 2022 by the authors. Licensee MDPI, Basel, Switzerland. This article is an open access article distributed under the terms and conditions of the Creative Commons Attribution (CC BY) license (https:// creativecommons.org/licenses/by/ 4.0/). experience depending on the learners' unique needs and preferences [3]. This approach allows students to choose their learning path while meeting formal learning objectives. In addition, it encourages students' independence and inventiveness [4].

Implementing FLS entails the integration of technology using e-learning resources, facilities, and equipment, including but not limited to laptops, smartphones, tablets, and others. A recent study by Santiago et al. [5] revealed that cellular mobile applications were the frequently used educational device and e-learning resources that support FLS. On the other hand, online learning platforms, both for synchronous and asynchronous classes, have become popular, especially among HEIs. Meanwhile, Google classroom has made it one of the leading extensively used online learning platforms for synchronous classes intended to promote learnability [6]. Kumar [7] claimed that the popularity of Google classroom is associated with its characteristics being cost-effective, easily accessible, and user-friendly. It improves student engagement, enhances group dynamics, allows for self-paced learning, information accessibility, and exchanging files between teachers and students and makes online learning faster [8]. Other emerging online learning platforms that were very popular for teaching and learning activities during the pandemic include Canvas, Microsoft Teams, and Edmodo. On the other hand, Northey et al. [9] examined the use of Facebook to facilitate asynchronous learning opportunities complementary to face-to-face interactions. Ramadan [10] finds Facebook to be an effective pedagogical and promising educational tool for conducting teaching and learning processes. Under remote learning during the pandemic, Barrot [11] recently claimed that students who use Facebook-based e-portfolio had outperformed those from the conventional portfolio group. Nevertheless, integrating technology and learning domains provides teachers and institutions with more freedom to use time and space in innovative ways that cater to the needs and interests of their students [12].

Despite the promising benefits of the flexible learning modality, several issues have spurred its implementation. In addition, among many reasons, educators may be relatively open or closed in their views about a flexible learning environment. Mishra et al. [13] point out that some faculty members who are not technologically knowledgeable will find adopting this approach challenging. In an FLS, teachers who are used to traditional teaching delivery must embrace technology despite their lack of technological literacy [14]. Teachers are compelled to rethink the changes in their teaching roles, the learning content, students' degree of attention, interest, passion, internet connectivity, and pedagogical knowledge [4,15,16].

Various factors are linked to amplified turnover rates due to technological advancements and the trend toward flexible learning in education. Among these were issues with student conduct, a lack of faculty input in educational decision-making, insufficient administrative support for the institution, and low remuneration [17]. Several studies in the USA have suggested that teachers' decisions about their jobs are influenced by their salaries [18]. Environmental, individual, and organizational factors can impact teacher turnover [19]. Li and Yao [20] found that burnout is a significant predictor of teachers' intention to leave the profession, while workload and stress significantly correlated with it. Moreover, teachers express concern about how to make students more visible on Internet-delivered courses; how to personalize instruction and student connection; how to involve students in extra interactive learning; how to differentiate and pace learning activities, and how to advance more effective strategies for learning, evaluation, and reflection and take care of health and safety of their students [21]. Likewise, teachers' view of the flexible learning environment stresses the importance of a good fit between the educational program, professional learning development, and the school design to create a thriving learning environment [16]. Additionally, in the case of developing economies such as the Philippines, IT infrastructure is one of the identified challenges which could hinder the smooth implementation of technology-driven instruction [22].

These challenges could affect the teacher's intention to teach in an FLS, which is associated with turnover intention [23]—an employee's final decision or action before leaving the organization [24]. Tett and Meyer [25] initially described turnover intention as a conscious and purposeful desire to quit the organization. A stream of the literature reveals various factors, including theoretical models, associated with turnover intentions [26,27]. One of the occupations with the highest turnover rates is teaching, with some insights offered in previous studies [28]. Since it requires direct interaction with essential stakeholders, teaching is a profession that provides high levels of emotional demands [28]. Emotional needs are associated with detrimental effects such as teacher burnout, job discontent, and diminished zeal [29]. Lee [30] found a clear correlation between burnout and teachers' intention to leave the profession. In addition, teachers find the job to be highly stressful due to student misbehaviors and disciplinary issues. Aloe et al. [31] found a link between student behavior and teacher turnover. Additionally, studies (e.g., Hanushek et al. [32]) show that geographical locations influence working circumstances, school and student characteristics, and teacher mobility. As a result, demanding schools typically experience greater levels of teacher turnover [33,34]. On the other hand, social support has been shown to interact with workplace stress factors in predicting the willingness to resign among various employees [35], including teachers [17,36]. Surprisingly, the findings revealed that teachers who felt they had received inadequate administrative support were more than twice as likely to leave their current position. However, due to technological advancements and the trend toward flexible learning in education, especially during the COVID-19 pandemic, the turnover rates of teachers have been amplified.

There are various models used to explain turnover intentions, including the Self-Determination Theory (SDT) [37], the Theory of Reasoned Action (TRA) [38], and the Theory of Planned Behavior (TPB) [39]. See Kim and Fernandez [40], Gagné and Deci [37], and Zhao et al. [41] for the SDT, TRA, and TPB applications. SDT offers insights into how employee empowerment positively impacts job satisfaction; thus, it can be a ground for employees not to leave their job [40]. It explores variables including employee empowerment, job satisfaction, and turnover intention. However, these constructs are weak in determining the volitional and non-volitional factors in leaving the teaching profession. For instance, to increase confidence and competence among teachers, they must first believe in their capacity to perform associated tasks (attitude), which is considered volitional behavior. Non-volitional factors refer to those behaviors following external factors, such as teachers having confidence because others think they are capable of performing the tasks. On the other hand, TRA includes only attitude, subjective norms, and turnover intention as variables. Distinct from TPB, which predicts non-volitional behaviors by incorporating perceptions of control over the performance of the behavior as an additional predictor, TRA restricts itself to volitional behavior [39,42]. Behaviors requiring skills, resources, and opportunities not freely available are not considered to be within the domain of applicability of the TRA [43,44] but are relevant in modeling turnover intentions. As an extension of the TRA, TPB expands the model's scope by incorporating perceived behavioral control (PBC) as an additional construct to address the non-volitional factors associated with behaviors. This makes the TPB more fitting in modeling turnover intentions, as evidenced in prior studies [41].

Despite the popularity of TPB in turnover intention studies, using technologies to support FLS requires a more elaborate model that captures teachers' confidence in the tech-savvy environment. Along this line, teachers' confidence tends to influence their view or attitude (volitional factors) on how well they can perform a specific task (i.e., learning activities in an FLS), as well as how others view them (non-volitional factors) in successfully executing the task. Others' knowledge of such confidence impacts their view on how teachers can perform those tasks. Popularly, in the domain literature, teachers' confidence is highly associated with self-efficacy and digital nativity (e.g., [41,45,46]). On the other hand, the current literature emphasizes the role of job satisfaction and organizational commitment on teachers' attitudes [47], which may have different variations among teachers than in other workforce groups. Job satisfaction promotes a positive workplace environment and enhances employee enthusiasm [48]. Consequently, when teachers are satisfied with

their jobs, it tends to affect their behavior in performing a given task [49]. Moreover, organizational commitment denotes employees' dedication to voluntarily rendering extra services beyond their specified scope of work to attain organizational goals [50]. The presence of commitment among employees impacts their attitude in performing required tasks, particularly in an FLS where more efforts are needed to become familiar with the technology-driven environment.

Thus, this study extends the TPB by incorporating self-efficacy and digital nativity in its primary constructs to better explain teachers' turnover intention, given that FLS is the primary mode of teaching and learning. In addition, consistent with several studies in the literature, job satisfaction and organizational commitment are considered antecedents of attitude within the context of TPB. Following the notion and some empirical evidence [51] that age affects the intention to work in a technology-focused environment, the proposed model integrates the role of age in teachers' turnover intentions. Some studies argue that younger workers are more adaptive to new technologies than older ones [52]. With a mix of young and old generations among faculties in HEIs, such an argument may hold ground. This extended TPB model is deemed more relevant in capturing idiosyncrasies associated with the presence of technologies to support FLS. Cross-sectional empirical validation of such a proposed extended TPB model is implemented in the faculties of Philippine HEIs with partial least squares-structural equation modeling (PLS-SEM). The insights of the proposed model would advance our understanding of the factors affecting teachers' turnover intention, which could be inputted into the design of human resource management interventions in HEIs amidst implementing the FLS in teaching and learning processes.

The rest of the paper is organized into the succeeding sections: Section 2 presents the review of the related literature, while Section 3 discusses the research hypotheses. Section 4 describes the methodological procedures and reports the result of the PLS-SEM analysis. Section 5 details the implications of the findings. Section 6 offers some practical insights into these findings, while Section 7 provides concluding remarks, limitations, and some future works.

2. Literature Review

2.1. Flexible Learning System

The abrupt increase in demand for digital technologies has remodeled schools away from deskbound whole-class instructional formats. A flexible learning system is an environment where learners can follow their learning paths given formal learning goals. Such a setting enables learners to have choices in their learning [53,54]. Kicken et al. [55] specifically looked into the benefits of providing students with particular online portfoliobased suggestions on how their skills would improve in a flexible context. Compared to students who merely received feedback, those who received counsel were better able to diagnose the possible causes of their weaknesses and developed more diagnostic learning requirements. Therefore, students' skills are likely enhanced. Muller et al. [56] presented the argument that students had a positive experience in an FLS and performed similarly with students under the typical instructional format. However, implementing a more open and flexible school design is considered challenging for the conventional organization with pre-defined structures, routines, and interaction practices [57]. The University of British Columbia [58] uses various methods, such as blended learning, Massive Open Online Courses, and experiential learning, to offer more opportunities for learners to control their learning process and improve their learning experiences.

On the other hand, prior research has shown that teachers view a variety of action possibilities in FLS. These include the potential for teacher consultation, participation and collaboration, novel time management strategies, continuous professional development, malleable learning environment design, positive impact on staff-student relationships, and a sense of connectedness and belongingness [59]. It provides a starting point for teachers to influence student engagement through constructivist and active pedagogies [60].

Possible barriers to adaptation include teachers' reluctance to alter established routines or collaboration, their inability to adjust to changes in teacher visibility and access, and organizational problems with flexible timetabling [16]. Additionally, institutional memory and routines have been described as having a significant influence on how teachers adjust. It has been challenging to develop a relevant pedagogy for FLS [61]. Kariippanon et al. [62] maintain that many teachers are likely to have deficient skills for manipulating the learning environment and mastering multiple ongoing engagements. According to Zeid et al. [63], successful teaching in open learning environments depends on teachers' methods in new learning environments and teachers' willingness to be committed to developing these practices.

With the onslaught of the COVID-19 pandemic, schools have been fully implementing flexible learning [64]. This paradigm shift has led to curriculum revisions [65] and the need to enhance teachers with the latest developments in FLS [66]. Moreover, Zhang et al. [67] highlighted some challenges in implementing FLS during the pandemic, including Internet connectivity problems and online teaching resources. These challenges tend to amplify the job stress of teachers in implementing FLS, who face many other issues.

2.2. Turnover Turnover Intentions

Teachers' turnover intention is widely recognized as a major challenge in the education sector [68], as it may lead to the loss of critical human resources. In addition, Räsänen et al. [68] attributed the lack of professional dedication and issues with the educational system and workload as the primary causes of teachers leaving their profession. Grant et al. [69] also observed that early childhood educators frequently change jobs, lowering instruction quality. Stressed or emotionally worn-out instructors are less able to foster children's growth and are more likely to quit their jobs [69]. Employees who endure unpredictable work situations, unrealistic expectations, limited prospects, and organizational stress are more likely to consider leaving their jobs [70]. In some cases, staff were forced to quit because they had difficulty handling their workloads [71]. Teachers also perceive that they are simultaneously and continuously facing new developmental tasks in the form of ongoing school reforms and educational innovations. This means less time to perform an increased amount of work. Hence, working as a teacher requires an increased capacity to tolerate continuing change, insecurity, unfinished tasks, and personal incompleteness. Employees' intention to leave their jobs can also be conceptualized as a desire to obtain a new position. McInerney et al. [72] identified dimensions of turnover intentions associated with attaining a new job, including (1) improved working environment and health, (2) desire for better promotion, higher income or compensation, and increasing one's capacity and willingness to advance, (3) more challenging jobs, convenient for transportation, and family support.

2.3. Theory of Planned Behavior

Icek Ajzen [73] proposed the TPB in predicting and explaining specific behaviors in different fields, including teachers' turnover intentions. The model comprises the basic constructs of attitude, subjective norm, and perceived behavioral control as antecedent variables towards a particular construct being investigated [74]. The notion that ability (behavioral control) and motivation (intention) work together to influence behavior is not new. It is typically believed that motivation and skill interact to promote behavioral success. Consequently, the behavior should be impacted by intentions to the extent that one has behavioral control, and behavior should increase motivation [39]. The main idea of the theory is to delineate the intention to perform a specific behavior being the principal predictor of the action [75]. The TPB has been widely used in studies whose primary goal is understanding how intention influences people's behavior [76]. For instance, in the context of teachers' turnover intentions, the attitude toward leaving the teaching profession (e.g., looking for an alternative job) is a personal view to act such behavior. Generally, the stronger the intention to engage in an activity, the more likely it must be carried out.

However, TPB has only limited constructs that cannot explain the phenomenon of turnover intention, particularly in the context of FLS, where technologies are mainstream. In contrast, the emerging literature on turnover intentions, job satisfaction, efficacy beliefs, and digital nativity have been explored in different contexts as an extension and modification of the TPB (e.g., [77–79]).

Modified TPB models have already been offered in existing literature (e.g., [80,81]). Empirical and theoretical evidence to support the additional variables to TPB is reviewed. Conner and Armitage [44] consider extending TPB to include the following constructs: (a) belief salience measures, (b) past behavior/habit, (c) perceived behavioral control, (d) self-efficacy, (e) moral norms, (f) self-identity, and (g) affective beliefs. Meanwhile, recent studies (e.g., [82]) incorporate self-efficacy and digital nativity as constructs to influence attitude, subjective norms, and perceived behavioral control. The existing literature highlights several areas where research suggests ways in which the TPB might be extended [83]. These include works on potential additional variables, such as belief salience, past behavior/habit, the structure of the perceived behavioral control construct, moral norms, self-identity, and affective beliefs.

3. Hypotheses Development

3.1. Self-Efficacy

Self-efficacy is defined by Bandura [84] as an individual's belief in their capabilities to achieve desired effects of their actions. Pajares [85] argued that efficacy beliefs impact academic settings, as evidenced in later studies [86,87]. In this context, teachers' self-efficacy may be characterized as a belief in their capacity to organize, plan, and carry out roles necessary to achieve specific educational objectives [49]. Teachers with high self-efficacy are more effective in teaching strategies, and their susceptibility to burnout is relatively low [88]. Several studies show an association between self-efficacy and attitude, covering job satisfaction and organizational commitment [27,89,90].

Cigdem and Topcu [91] found that subjective norms and self-efficacy positively correlate with instructors' behavioral intention to use a Learning Management System (LMS). For example, self-efficacy and subjective norms have been used as psychological determinants to influence the use of LMS [92]. Additionally, Doanh and Bernat [93] revealed a positive impact of self-efficacy on subjective norms in the context of entrepreneurial education. In this view, it is relevant to investigate the association between self-efficacy and subjective norms and their influence on teachers' intention to continue teaching in a flexible learning environment. Furthermore, the emerging literature suggests a positive relationship between self-efficacy and perceived behavioral control in the context of teaching and learning. For example, Doanh and Bernat [93] reported that entrepreneurial self-efficacy among students influences perceived behavioral control with mediating effects via attitude. Youn et al. [94] described self-efficacy as a coping appraisal that positively affects behavioral control toward switching behavior during the COVID-19 pandemic. Therefore, we hypothesize that:

H1: Self-efficacy directly impacts attitude.

H2: Self-efficacy directly impacts subjective norms.

H3: Self-efficacy directly impacts perceived behavioral control.

3.2. Digital Nativity

Prensky [95] defined digital natives as someone who grew up familiar with digital technologies. He added that the problem with the rapid changes in technology in teaching is whether our digital immigrant teachers, who grew up in the pre-digital age, are adopting the language of the digital native students. Digital native is defined as those who were born after the 1980s and are native speakers of the languages of digital technologies [96]. However, it is noteworthy to establish a position regarding digital nativity following the debates in the domain literature, including the arguments put forward by Kirschner and De

Bruyckere [97]. Here, digital nativity adheres to the critical information-seeking behavior of individuals in a digital domain rather than the idea that digital natives can multitask or process information simultaneously [97]. In this light, the digital nativity of individuals is associated with their capacity to seek information in a digital platform, assess the quality of the same information, and process those pieces of information to generate knowledge or inference. Gretter and Yadav [98] reported a positive correlation between attitude and media literacy. Thus, it is crucial to investigate the effects of digital nativity on the primary constructs of TPB (i.e., attitude, subjective norms, and perceived behavioral control), as evidenced by the work of Milutinović [99]. The following hypothesis is proposed:

H4: *Digital nativity directly impacts attitude.*

H5: *Digital nativity directly impacts subjective norms.*

H6: *Digital nativity directly impacts perceived behavioral control.*

3.3. Job Satisfaction

Locke [100] identified job satisfaction as a positive affective state resulting from assessing one's job involvement. In some literature, job satisfaction combines psychological, physiological, and environmental factors that affect an employee's job satisfaction level [101]. Job satisfaction enables enthusiasm and positively affects interpersonal relationships [48]. However, a lack of this approach can result in adverse outcomes. Teachers' job satisfaction is characterized by Skaalvik and Skaalvik [49] as teachers' attitudes toward their work and teaching tasks and responsibilities. In addition, several factors affect teachers' satisfaction levels at work, such as academic independence, a light workload, adequate preparation time [102], the nature of work, and communication [26]. Cherian et al. [103] revealed that an employee's attitude toward work negatively affects their performance and job satisfaction. Thus, we hypothesized that:

H7: *Job satisfaction directly impacts attitude.*

3.4. Organizational Commitment

Commitment is commonly defined as the attitude of the employees toward their organization, willingness to work hard for the employer, and the intent to remain with that organization [104]. As defined by Porter et al. [105], organizational commitment refers to the extent to which the individual identifies with and participates in a given organization. This follows a conceptualization that employees are considered dedicated to an organization if they voluntarily extend their relationship with the organization and set out significant efforts to accomplish organizational goals [106]. The organizational commitment of university faculty is essential because academic work has become more unstable and under strain, which reduces faculty members' psychological attachment to a higher education institution [96]. Straatmann et al. [107] revealed that the attitude of the employees towards organizational changes impacts change-supportive intentions, which are descriptive of their attitude towards a specific behavior. Several studies used job satisfaction and organizational commitment to delineating attitudes toward adopting new technologies [108]. In general, to explore the effect of organizational commitment on attitude, we hypothesized that:

H8: Organizational commitment directly impacts attitude.

3.5. Attitude

Attitude is defined by Allport [109] as a "psychological state of readiness organized by experience and has a direct or dynamic impact on how a person reacts to all things and circumstances that are relevant to it". In other words, attitude is the individual's way of thinking that affects their behavior. Cropanzano and Konovsky [110] emphasize that attitudes toward their job impact their performance and dedication to their tasks and responsibilities. Additionally, the teachers' positive attitude precisely fulfills their responsibilities and can effectively adapt to changes in the learning environment [111]. Several studies investigated the effect of implementing a flexible learning environment in higher education (e.g., [64,112]). Thus, we hypothesized that:

H9: Attitude directly impacts the teacher's intention to teach in a flexible learning environment.

3.6. Subjective Norms

Ajzen [39] defined a subjective norm as "the belief of an individual to perform a specific behavior based on how the people important to him think". Midthassel [113] reported that in a learning community, behavior is shaped by shared goals, shared values, and regular personal contacts. Kam et al. [114] described subjective norms as the perceived social pressure to perform or not perform a specific behavior. Emerging literature revealed that positive support from significant people affects the individual's intention to act on a particular behavior. For instance, Li et al. [115] showed that teachers have positive attitudes toward innovation or a method of teaching when it is endorsed by an influential group of people (e.g., the head of the school). Therefore, the following hypothesis is proposed:

H10: Subjective norms will directly affect teachers' intention to teach in a flexible learning environment.

3.7. Perceived Behavioral Control

Perceived behavioral control is defined as the teacher's perspective of how easy or difficult it is to carry out the desired behavior [39]. In a general sense, it concerns the subjective appraisal of the level of difficulty associated with performing a given behavior [75]. The TPB model is believed to capture the phenomenon that when teachers have control over technology usage, the intention to use technology will be higher [116,117]. This implies that when the teacher has confidence in their ability to teach in a flexible learning environment, the greater their perceived control. Thus, the following hypothesis is proposed:

H11: Perceived behavioral control directly affects teachers' intention to teach in a flexible learning environment.

3.8. Intention to Teach in Flexible Learning System

Higher education has embraced FLS and distance learning for several reasons, including its potential to increase institutional efficiency, increase student access to higher education, provide the institution a competitive edge, and enhance the students' learning experiences [118]. Open and flexible learning environments involve multiple classes, multiple teachers, and technology-enhanced common spaces without designated desks for students or teachers' podiums (e.g., [119–121]). It has been argued that teacher adaptation is necessary for working in open and flexible learning environments. In times of crisis (e.g., the COVID-19 pandemic), rapid changes, such as the transition from face-to-face classes to flexible learning initiatives, may affect teachers' turnover intentions. This is evidenced by Boamah et al. [122], where interference, burnout, and career-oriented abrupt changes affect teachers' turnover intentions. In contrast, digital natives and even digital immigrant teachers are open to changes and could quickly adopt rapid changes brought about by the FLS [112]. Likewise, Masanet et al. [123] observed varied typologies of adaptability and flexibility among students and teachers, which even documented how non-digital natives move to digital apprentices to cope with the challenges of flexible learning. In this case, the intention to teach in FLS does not reflect a positive relationship with turnover intention. Thus, the literature cited supports the argument that the intention to teach in FLS negatively impacts the intention to quit teaching in the context of FLS implementation.

H12: Teachers' intention to teach in an FLS negatively affects their intention to leave the teaching profession.

3.9. Age as a Moderating Variable

Several studies show how age affects work attitudes, behaviors, performance, and preferences within organizations (e.g., [51,124,125]). Meyer [54] claimed that younger workers adapt to new technologies better than older ones. This leads to the unsound judgment that older workers cannot adopt technological innovations quickly. Although Betts et al. [126] reported a case of older adults who are successful users of digital technology, the concept that other people still believe they are incapable affects the subjective norm perceptions along this line. In effect, the idea extends to their perceptions of how difficult or easy it is to perform the behavior involving behavioral control. Thus, we hypothesized that:

H13: Age moderates the relationship between attitude and the teacher's intention to teach in an FLS.

H14: *Age moderates the relationship between subjective norms and the teachers' intention to teach in an FLS.*

H15: *Age moderates the relationship between perceived behavioral control and the teacher's intention to teach in an FLS.*

3.10. Intention to Leave the Teaching Profession

The withdrawal of teachers from their positions has become a global issue. Tanas et al. [127] pinned the importance of cognition on technology integration for a graceful transition to flexible teaching. They added that the difficulty in developing such a cognition resulted in burnout and intention to leave the profession. In addition, several studies revealed that teachers' intention to leave the teaching profession is due to factors such as teachers' self-efficacy, job satisfaction [128], and organizational commitment [129]. The present study investigated how job satisfaction and demographic factors relate to teachers' intention to leave the profession is regarded as an immediate antecedent to an actual career change or job turnover [65].

The proposed extended TPB model is shown in Figure 1.

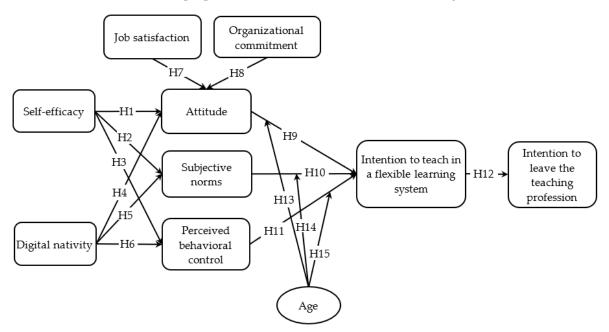


Figure 1. An extended TPB model of teachers' turnover intentions.

4. Methods

4.1. Sampling and Data Collection

The measurement items of each construct in this study were adopted from measures in prior works (see Appendix A). Self-efficacy (SE) has five measurement items, digital nativity

(DN) has five, attitude (A) has six, subjective norms (SN) have five, job satisfaction (JS) has five, organizational commitment (OC) has five, perceived behavioral control (PBC) has five, intention to teach in a flexible learning environment (ITF) has six, and the intention to leave the teaching profession (ILTP) has five. The data were obtained through a survey instrument that measures all the constructs using a 7-point Likert scale. The survey instrument was refined by academic experts who revised the wording to apply to the context of employee turnover in the education sector. The study surveyed teachers in HEIs holding either part-time or full-time positions.

4.2. Data Collection

The data was gathered through online and face-to-face questionnaire completion. The survey questionnaire was translated into Google forms and distributed to around 450 participants for four weeks. There were 426 responses collected, five of which were gathered personally, and 421 were obtained online. Out of the 426, only 417 were valid and were used for the final analysis after removing some non-interactive responses.

4.3. Profile of the Participants

The majority of the participants are between 31–36 years old (22.3%) and full-time (72.2%), wherein 53.0% (male) faculty have doctorate degrees (46.5%). Most have been teaching for at least 15 years (35.3%). At the time of the survey, most participants have a hybrid work set-up (i.e., a combination of work-from-home and on-site reporting) (67.9%). The majority have 7–9 h of daily online teaching work (42.7%) and 4–6 h of online teaching (35.3%), with 19–24 h of teaching hours per week (15.3%). The summary of their profile is shown in Table 1.

Table 1. Profile of the participants.

Category	n	%	Category	n	%
Age			Modeofteaching		
20–24 years old	25	6.0	Work from home	82	19.7
25–30 years old	90	21.6	Onsite reporting	52	12.5
31–36 years old	93	22.3	Mixed (i.e., work from home	283	67.9
37–42 years old	81	19.4	and onsite reporting)		
43–48 years old	69	16.5	Numberofhoursteachingonlineperday		
49–54 years old	33	7.9	0–3 h	75	18.0
55–60 years old	16	3.8	4–6 h	147	35.3
61 years old	10		7–9 h	178	42.7
and above	10	2.4	10 h onward	17	4.1
Sex			Numberofteachinghoursperweek		
Male	221	53.0	0–6 h	24	5.8
Female	196	47.0	7–12 h	39	9.4
Highest educational attainment			13–18h	56	13.4
Bachelor's	114	27.3	19–24 h	64	15.3
degree	114	27.5	19–24 II	04	15.5
Master's	109	26.1	25–30 h	51	12.2
degree	109	20.1	25 – 50 H	51	12.2
Doctorate	194	46.5	31–36 h	26	6.2
degree	194	40.3	51–50 II	20	0.2
Total number of years in the teaching	profession		37 h and above	157	37.6
0–2 years	65	15.6	Tenure		
3–5 years	83	19.9	Full-time faculty	301	72.2
6–8 years	55	13.2	Part-time faculty	116	27.8
9–11 years	36	8.6			
12–14 years	31	7.4			
15 years and above	147	35.3			

4.4. Data Analysis Results

The data was analyzed using PLS-SEM. PLS-based SEM is a more reliable and comprehensive statistical method for evaluating structural models [130]. It is most useful when dealing with a complex model, small sample size, non-normally distributed data, formative measures, and predictive and exploratory research [131]. SmartPLS software (developed by Dr. Jan-Michael Becker from Norway, version 3.3.9), was used to analyze the data.

4.5. Measurement Model Assessment

The PLS analysis allows for parallel testing of the outer measurement model and the inner structural model and the presence of reflective and formative latent variables [132]. Since the proposed model includes reflective measures, the first criterion in evaluating the model is to examine the measures' reliability and validity [131]. Based on the measurement model assessment result, all indicators were convergent and reliable, as shown in Table 2, where the factor loading for each item is greater than 0.70 [133]. All measures for each construct were found valid. With Average Variance Extracted (AVE) statistics greater than the threshold value of 0.5, all constructs have appropriate convergent validity [134], ranging from 0.645 to 0.906.

Items	Loadings	AVE	Cronbach α	CR	Items	Loadings	AVE	Cronbach α	CR
A1	0.818	0.677	0.905	0.926	JS3	0.903			
A2	0.791				JS4	0.858			
A3	0.808				JS5	0.92			
A4	0.857				OC1	0.779	0.666	0.876	0.909
A5	0.829				OC2	0.813			
A6	0.834				OC3	0.852			
DN1	0.617	0.645	0.860	0.900	OC4	0.855			
DN2	0.846				OC5	0.778			
DN3	0.853				PBC1	0.862	0.713	0.898	0.925
DN4	0.839				PBC2	0.869			
DN5	0.836				PBC3	0.881			
ILTP1	0.914	0.906	0.974	0.980	PBC4	0.85			
ILTP2	0.954				PBC5	0.752			
ILTP3	0.961				SE1	0.775	0.655	0.868	0.905
ILTP4	0.971				SE2	0.798			
ILTP5	0.957				SE3	0.808			
ITF1	0.925	0.857	0.967	0.973	SE4	0.84			
ITF2	0.933				SE5	0.824			
ITF3	0.928				SN1	0.869	0.743	0.913	0.935
ITF4	0.937				SN2	0.896			
ITF5	0.94				SN3	0.889			
ITF6	0.891				SN4	0.811			
JS1	0.79	0.763	0.922	0.941	SN5	0.844			
JS2	0.892								

Table 2. Measurement model assessment results.

Note: α = Cronbach's alpha; CR = composite reliability; AVE = average variance extracted; A = attitude; DN = digital native; ILTP = intention to leave the teaching profession; ITF = intention to teach in flexible learning environment; JS = job satisfaction; OC = organizational commitment; PBC = perceived behavioral control; SE = self-efficacy; SN = subjective norm.

Furthermore, all measurement items were reliable, with all constructs scoring above Cronbach's alpha (α) and composite reliability (CR) threshold values of 0.70 [131]. Cronbach's alpha values range from 0.860 to 0.974, and CR values range from 0.900 to 0.980. These values are considered high, indicating high reliability. Hair et al. [135] argued that values between 0.70 and 0.95 are considered satisfactory to good. Table 2 provides a summary of the measurement model results.

The correlations of the measures of potential overlapping variables are used to assess the degree to which the measurement items measure distinctively among constructs [135]. The square root of AVE was calculated to ensure discriminant validity. The AVE of the constructs was found to support discriminant validity because it is greater than the squared correlation of each latent variable [134]. Table 3 bolds the square roots of the AVE, while non-bolded values represent the intercorrelation value between constructs. All off-diagonal values are less than the square roots of AVE, indicating that Fornell and Larker's condition is satisfied. Moreover, the SmartPLS algorithm generates the heterotrait-monotrait (HTMT) criterion output. Table 4 shows the valid HTMT value for each construct, which is less than 0.85. The HTMT values range between 0.104 and 0.803. Overall, the measurement model's reliability and validity tests were met. All items used to measure constructs in this study are valid and fit to estimate parameters in the structural model.

Table 3. Fornell and Larcker results.

	Α	DN	ILTP	ITF	JS	OC	PBC	SE	SN
А	0.823								
DN	0.422	0.803							
ILTP	-0.23	-0.084	0.952						
ITF	0.623	0.412	-0.194	0.926					
JS	0.694	0.43	-0.193	0.754	0.874				
ÔC	0.685	0.519	-0.205	0.668	0.725	0.816			
PBC	0.642	0.529	-0.183	0.75	0.734	0.719	0.844		
SE	0.622	0.5	-0.164	0.574	0.647	0.617	0.651	0.809	
SN	0.548	0.43	0.003	0.612	0.647	0.627	0.652	0.525	0.862

Note: square root of AVE is shown on the diagonal of the matrix in bold; inter-construct correlation is shown off the diagonal.

Table 4. HTMT results.

	Α	DN	ILTP	ITF	JS	OC	PBC	SE	SN
А									
DN	0.471								
ILTP	0.240	0.104							
ITF	0.661	0.443	0.192						
JS	0.750	0.469	0.196	0.796					
ÔC	0.743	0.599	0.204	0.717	0.791				
PBC	0.710	0.592	0.189	0.801	0.803	0.799			
SE	0.696	0.567	0.175	0.621	0.715	0.697	0.738		
SN	0.595	0.477	0.054	0.650	0.703	0.697	0.719	0.590	

The research model fitness demonstrates an acceptable fit with a Standardized Root Mean Square Residual (SRMR) value of 0.052 and a common acceptable fit value of 0.08. The Normed Fit Index (NFI) value is 0.847, reflecting a moderate acceptable value with the threshold of NFI < 0.90. The NFI generates values ranging from 0 to 1. The closer the NFI is to one, the better the fit. In general, NFI values greater than 0.9 imply an excellent fit.

4.6. Structural Model

The influence of the independent variables on the dependent variable is tested using a structural model [135]. When using PLS-SEM, the three main factors used to assess the structural model are the strength of the path coefficients, R^2 values (prediction power), and f^2 (effect size) [131]. The path coefficients of the structural model indicate that the 11 hypotheses are supported (H1, H2, H3, H5, H6, H7, H8, H9, H10, H11, H12), and only 1 is not supported (H4). The results are summarized in Table 6 (Figure 1). The acceptable R^2 values of 0.75, 0.50, and 0.25 correspond to significant, moderate, and modest levels of prediction accuracy, respectively [133,136]. The coefficient of determination (R^2) in this study provides the predictive accuracy of the structural model, as indicated in Figure 2. ITF is explained to have the highest variance with an R^2 value of 0.609 (61%), followed by the attitude with an R^2 value of 0.572 (57%). Thus, the R^2 criterion is met, and the predictive ability of the structured model is considered moderately high. These are summarized in Table 5, with an illustration in Figure 2.

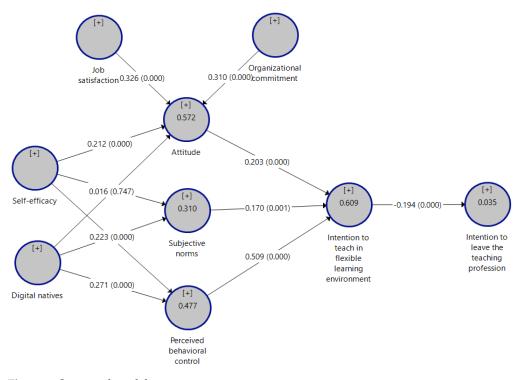


Figure 2. Structural model.

Table 5. Path coefficient results.

Hypotheses	β	t Values	p Values	Decision
H1: Self-efficacy \rightarrow Attitude	0.212	4.017	< 0.001	Supported
H2: Self-efficacy \rightarrow Subjective norms	0.414	7.506	< 0.001	Supported
H3: Self-efficacy \rightarrow Perceived behavioral control	0.516	10.979	< 0.001	Supported
H4: Digital nativity \rightarrow Attitude	0.016	0.322	0.747	Not supported
H5: Digital nativity \rightarrow Subjective norms	0.223	3.8	< 0.001	Supported
H6: Digital nativity \rightarrow Perceived behavioral control	0.271	4.958	< 0.001	Supported
H7: Job satisfaction \rightarrow Attitude	0.326	5.277	< 0.001	Supported
H8: Organizational commitment \rightarrow Attitude	0.31	5.154	< 0.001	Supported
H9: Attitude \rightarrow Intention to teach in a flexible learning environment	0.203	4.23	< 0.001	Supported
H10: Subjective norms \rightarrow Intention to teach in a flexible learning environment	0.17	3.184	0.001	Supported
H11: Perceived behavioral control \rightarrow Intention to teach in a flexible learning environment	0.509	8.576	< 0.001	Supported
H12: Intention to teach in a flexible learning environment \rightarrow Intention to leave the teaching profession	-0.194	3.79	< 0.001	Supported

The effect sizes (f^2) were estimated using the SmartPLS algorithm, indicative of a minor, medium, or substantial effect on the link between exogenous and endogenous constructs with f^2 values of 0.02, 0.15, and 0.35, respectively [131]. A value less than 0.02 indicates that exogenous constructs do not affect endogenous constructs. The f^2 results show that SE has a substantial effect on PBC ($f^2 = 0.369$), and PBC substantially affects ITF ($f^2 = 0.307$). Furthermore, ITF has a small effect on ILTP ($f^2 = 0.039$). It is worth mentioning that A has a small effect size on ITF ($f^2 = 0.059$) and has received little to no effect from other constructs, as indicated in Table 6. These results are consistent with the other findings in this study.

	Α	ILTP	ITF	PBC	SN
Attitude			0.059		
Digital nativity	0			0.108	0.054
Intention to leave the teaching profession					
Intention to teach in a flexible learning environment		0.039			
Job satisfaction	0.102				
Organizational commitment	0.094				
Perceived behavioral control			0.307		
Self-efficacy	0.054			0.369	0.181
Subjective norms			0.04		

Table 6. Effect size results.

A moderating variable influences the direction or strength of the relationship between dependent and independent variables [137]. The moderating effect occurs when the relationship between two variables is moderated or affected by a third variable [137]. In this study, age is used as a moderating variable. The result shows that age does not have any moderating effect on the relationship between A and ITF (H13), PBC and ITF (H14), and SN and ITF (H15). Table 7 (Figure 3) provides a summary of the results. The orange-colored constructs in Figure 3 relate to the analysis of the moderating effect of age as reflected in the SmartPLS version 3.3.9.

Table 7. Moderating effects results.

Hypotheses	β	t Value	<i>p</i> -Value	Decision
H13: $A \times Age \rightarrow$ Intention to teach in a flexible learning environment	0.015	0.261	0.794 ^{ns}	Not supported
H14: PBC \times Age \rightarrow Intention to teach in a flexible learning environment	0.007	0.098	0.922 ^{ns}	Not supported
H15: SN×Age \rightarrow Intention to teach in a flexible learning environment	-0.028	0.444	0.657 ^{ns}	Not supported

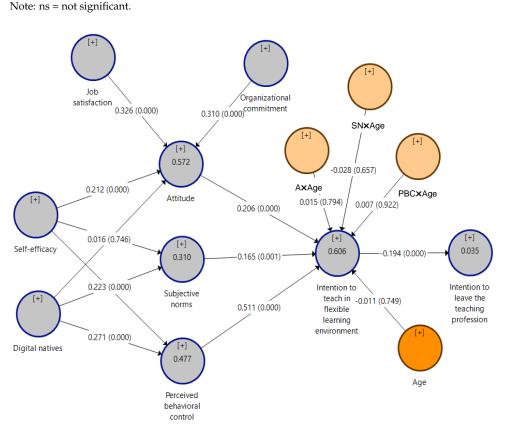


Figure 3. The structural model with moderating effects.

4.7. Robustness Check

To address the concern of possible endogeneity problems, the study utilizes the Gaussian copula (GC) approach suggested by Hult et al. [138]. The Gaussian copula approach allows for the use of Gaussian copulas in the absence of control variables and instrumental variables. The procedure requires the distribution of the latent variable scores of the independent variables to have a non-normal distribution. Using the Kolmogorov-Smirnov test, the *p* values of the independent variables were found to be all less than 0.001, implying non-normal distributions. For brevity, the results of the Kolmogorov-Smirnov test are not presented here. The procedure then computes the Gaussian copulas and allows them to be included in the model. Park and Gupta [139] allowed for the use of multiple copulas in a regression model. The results in Table 8 show that Gaussian copulas for Self-Efficacy \rightarrow Attitude, Digital Natives \rightarrow Subjective Norms, Digital Natives \rightarrow Perceived Behavioral Control, Job Satisfaction \rightarrow Attitude, Attitude \rightarrow Intention to Teach in Flexible Learning Environment, and Intention to Teach in a Flexible Learning Environment \rightarrow Intention to Leave the Teaching profession, have critical levels of endogeneity having, p values of less than 0.005. The β column in Table 8 presents the original path coefficients, while the β' column shows the path coefficients when the Gaussian copulas are included in the model. The results show a change in the path coefficients when the Gaussian copulas are added. The β' coefficients of the original path relationships represent the exogenous part free from endogeneity issues, while the Gaussian copulas represent the endogeneity part. It is worth noting that only one of the original hypothesized relationship results, i.e., Self-efficacy \rightarrow Attitude, changes from a significant relationship to an insignificant one. The rest of the results remain the same.

Table 8. Gaussian Copula results.

Hypotheses	β	p Values	β′	p Values	Decision
Self-efficacy \rightarrow Attitude	0.212	< 0.001	0.074	0.235 ^{ns}	Not supported
Self-efficacy \rightarrow Subjective norms	0.414	< 0.001	0.318	0.007	Supported
Self-efficacy \rightarrow Perceived behavioral control	0.516	< 0.001	0.565	< 0.001	Supported
Digital nativity \rightarrow Attitude	0.016	0.747 ^{ns}	0.092	0.121 ^{ns}	Not supported
Digital nativity \rightarrow Subjective norms	0.223	< 0.001	0.382	< 0.001	Supported
Digital nativity \rightarrow Perceived behavioral control	0.271	< 0.001	0.413	< 0.001	Supported
Job satisfaction \rightarrow Attitude	0.326	< 0.001	0.436	< 0.001	Supported
Organizational commitment \rightarrow Attitude	0.310	< 0.001	0.320	0.001	Supported
Attitude \rightarrow Intention to teach in a flexible learning environment	0.203	< 0.001	0.352	< 0.001	Supported
Subjective norms \rightarrow Intention to teach in a flexible learning environment	0.170	0.001	0.206	0.045	Supported
Perceived behavioral control \rightarrow Intention to teach in a flexible learning environment	0.509	< 0.001	0.471	< 0.001	Supported
Intention to teach in a flexible learning environment \rightarrow Intention to leave the teaching profession	-0.194	<0.001	-0.308	0.003	Supported
GC (Self-efficacy) \rightarrow Attitude			0.131	0.027	
GC (Self-efficacy) \rightarrow Subjective norms			0.103	0.164	
GC (Self-efficacy) \rightarrow Perceived behavioral control			-0.036	0.354	
GC (Digital nativity) \rightarrow Attitude			-0.062	0.112	
GC (Digital nativity) \rightarrow Subjective norms			-0.125	0.036	
GC (Digital nativity) \rightarrow Perceived behavioral control			-0.117	0.04	

Hypotheses	β	<i>p</i> Values	β′	p Values	Decision
GC (Job satisfaction) \rightarrow Attitude			-0.103	0.046	
GC (Organizational commitment) \rightarrow Attitude			-0.007	0.451	
GC (Attitude \rightarrow Intention to teach in a flexible learning environment)			-0.148	0.042	
GC (Subjective norms) \rightarrow Intention to teach in a flexible learning environment			-0.03	0.38	
GC (Perceived behavioral control) \rightarrow Intention to teach in a flexible learning environment			0.04	0.307	
GC (Intention to teach in a flexible learning environment) \rightarrow Intention to leave the teaching profession			0.153	0.05	

Table 8. Cont.

Note: ns = not significant; GC = Gaussian copula.

5. Discussions

This section presents the salient features of the PLS-SEM analysis and how these results can be applied to the current discussions of teachers' turnover intentions attributed to the implementation of FLS. The findings of our empirical study suggest that self-efficacy directly impacts subjective norms (H2) and perceived behavioral control (H3), and these agree with previous findings (e.g., [27]). Teachers' beliefs on their capabilities in FLS would influence others on their views on the capacity to implement FLS. Consequently, it would improve one's thinking of how others perceive such potentiality, especially those who matter to them. For instance, people observing teachers with strong convictions about their competence in using associated technologies in FLS would positively view their competence in performing necessary tasks. Similarly, higher self-efficacy improves behavioral control [93,94]. Teachers with strong beliefs about their capabilities to manage students in virtual environments tend to have greater control in performing initiatives that promote self-paced learning among students in FLS. As a case in point, if teachers believe that they can control the potential disruptive behavior of students and motivate those who show a lack of interest in schoolwork, they will tend to pursue teaching as they would find themselves effective in teaching via the FLS modality.

Despite growing with and speaking the language of digital technologies, results revealed that these characteristics do not affect teachers' attitudes (H4) toward FLS. This finding contradicts the insights of Gretter and Yadav [98], suggesting a positive correlation between attitude and media literacy. Even with highly proficient teachers with technologies, especially for information gathering and social communication purposes, their attitude towards FLS does not depend on this competency. With the opportunity to gather in small select groups and teachers' perception of the adequacy of equipment as part of the indicators of the attitude construct, they are deemed independent of teachers' level of digital nativity. This finding implies that despite teachers' proficiency in FLS technologies, the absence of adequate supportive equipment may be detrimental to implementing FLS. Furthermore, the characteristic of FLS that promotes self-paced learning among students may be less associated with digital nativity. Meanwhile, digital nativity directly impacts subjective norms (H5). This implies that the belief that teachers could teach in an FLS by the people they consider important affects teachers' view of themselves regarding the easy manipulation of digital technologies. This insight is consistent with the findings of Milutinović [99]. The result of H6 is more straightforward as digital natives are more likely comfortable with the technology demands of FLS. Teachers with higher levels of digital nativity could design effective teaching-learning materials such as podcasts, interactive videos, asynchronous activities, and gamification platforms in learning and promote authentic assessment tools of student performance.

The results of this work establish the significant influence of job satisfaction on attitude (H7). It supports an established stream of literature on the topic (e.g., [140]). It implies that teachers are far more likely to have a positive attitude toward their intention to teach in FLS if they achieve contentment or fulfillment with their jobs, which may consequently impact their intention to quit teaching. Moreover, organizational commitment directly influences attitude (H8). This result supports the findings of Straatmann et al. [107] and Yousef [108]. Teachers with a strong commitment to the organization, who work hard to achieve the desired organizational goals and put in a great deal of effort beyond what is normally expected from them, tend to have a positive outlook on teaching FLS. As the requirements of FLS are disruptive to the status quo, the criticality of change-supportive commitment among teachers becomes imperative, as highlighted by Straatmann et al. [107]. Learning educational technologies promotes appropriate pedagogical practices, revitalizes assessment tools, and reinvents classroom management practices.

Hypotheses H9, H10, and H11 represent the traditional relationships of the TPB model, which are supported by various studies in the literature [41,141]. From these hypotheses, attitude (H9), subjective norms (H10), and perceived behavioral control (H11) affect the intention of teachers to teach in FLS, as suggested by an $R^2 = 0.609$, with perceived behavioral control as the strongest predictor of the intention with $f^2 = 0.369$. The teachers' perspective regarding the adequacy of supportive learning technologies, professional networking, and their morale in implementing FLS positively relates to their intention to teach in such a modality. When these provisions are limited, a substantial portion of their intention to teach in FLS would be diminished. In addition, the intention to teach is significantly affected by social pressures, particularly with people who have a direct influence on teachers (e.g., deans, supervisors, colleagues, and family members). Finally, relevant resources, knowledge, and skills enhance the ability to control better the teaching-learning process, which is considered highly critical in predicting the intention to teach in FLS. This insight contributes significantly to the domain literature by highlighting perceived behavioral control as positively associated with teaching and, consequently, the intention to leave the profession within the context of FLS modality in teaching. This might be attributed to the disruptive demands of FLS, particularly with the advent of technologies and the necessary skills associated with it, which are not yet considered mainstream among teachers, especially in the case study. It suggests that teachers must gain the required control, reflected by the availability of technologies, capacity-building initiatives, and supportive organization, in effectively carrying out the requirements of FLS before establishing the intention to teach. Limited resources and support may compel them to re-evaluate their intention to teach in the FLS modality.

When age is introduced as a moderating variable to the relationship between attitude, subjective norms, and perceived behavioral control, this study finds such an effect of age insignificant. This is brought about by the possible migration of non-digital natives (i.e., highly associated with age) to adapt to the skills needed for implementing FLS. Lastly, the PLS-SEM analysis determines the relationship between the intention to teach in FLS and the intention to leave the teaching profession. The findings show a significant parameter estimate of -0.194. It supports the agenda that their intention to quit the teaching job can be predicted by their intention to teach under an FLS modality. Thus, when an FLS mode is imposed in an HEI, a critical mass of human resources with a low perception of FLS may look for another university which is not forcing FLS or move to another non-teaching job. Administrators may subscribe to the insights of this study to enhance teachers' intention to adopt the FLS mode of the teaching-learning process to retain valuable human resources. Nevertheless, the model proposed and validated in this study successfully integrates the TPB to examine turnover intentions in the teaching workforce. The 11 supported hypothesized paths are an affirmation of the strength of the proposed model. These results indicate that future works may modify antecedent variables, extend to different workforce groups, and incorporate existing relevant models. For example, there are levels of digital nativity among generations. A deeper understanding of age-groups taken in

different periods is needed. Moreover, one can investigate when and in what context the instructors can feel more confident with their actions. This idea can be extended with Bandura's [142] dimensions of self-efficacy beliefs, most especially on mastery experiences and vicarious experiences. Another possibly deeper analysis can be viewed with different dimensions of organizational commitment (e.g., creativity and continuance commitment, goal commitment). The high explanatory power of the endogenous variables in the model (i.e., attitude and intention to teach in FLS) suggests the model's strength.

6. Practical Insights

This section provides practical insights based on the critical findings of the study that might be useful to higher education stakeholders and university leaders. The high explanatory power of the proposed extended TPB constructs on the intention to teach in FLS, and the consequent turnover intention of teachers becomes an essential takeaway for educational leaders. Designing initiatives that support the insights of the proposed model would be useful since the attitude, behavioral support, and control of the teachers, who are considered the main actors in implementing FLS, are hypothetically supported. The contributory aspect of attitude, intention, and ability to perform the tasks in teaching must be aligned with the policy directions to the design elements of an FLS. For example, since FLS supports personalized learning for students, it is beneficial to provide support and empower the teachers to develop learning spaces or personalized learning dashboards within a curricular offering. Along this line, it should be noted that the presence of idiosyncrasies may need HEIs to design their FLS. This addresses various learning needs that may be specific to a particular case.

On the other hand, as the emerging literature suggests, job satisfaction and organizational commitment factors remain intangible factors that university leaders must consider in improving teachers' attitudes toward implementing FLS. Together with self-efficacy, these factors explain about 57% of the total variation of the attitude construct. In this study, teachers expect more support to properly implement a flexible learning environment, especially on the infrastructure. In most developing countries, such as the Philippines, infrastructure that supports information technology (IT) and Internet connectivity is a pressing challenge in conducting remote and online teaching. For instance, the Philippine regulatory commission has released a marching order to sustain flexible learning in higher education, highlighting the retrofit of facilities in HEIs. There are limited technology-enhanced experiences with poor Internet connectivity, and factors such as systems interactivity, infrastructure interoperability, and user interface designs of the learning platforms cannot be evaluated with certainty. The strength of the IT infrastructure can also shape teachers' efficacy, especially on pedagogical consequences to carry out the needs of FLS. Consequently, these factors impact teachers' turnover intention in light of the FLS implementation.

The antecedent variables (i.e., self-efficacy and digital nativity) have shown importance in explaining the TPB factors (i.e., attitude, subjective norms, and perceived behavioral control) toward implementing FLS, except for self-efficacy on attitude. Emerging results consistently imply the importance of digital nativity in the current learning environment, especially in view of FLS. Notably, this work reveals no moderating effect of age on the intention to teach in FLS. Thus, policy directions must consider digital nativity and selfefficacy for all age groups to address the difficulty in the FLS implementation. For instance, capability training of teachers on the delivery of topics in FLS shall be continually administered. These training programs must be carefully designed, emphasizing appropriate technologies and support tools, such as interactive remote learning materials, asynchronous activities, and game-based learning platforms, that are consistent with the characteristics of FLS. Aside from designing appropriate training programs, the fast-changing upgrades of technology must be considered to anticipate new challenges and sustain the implementation of a flexible learning environment.

Finally, the proposed structural model comprising the intention to teach in FLS inversely varies with the intention of teachers to leave the teaching profession. Although with a small percentage of explanatory power (3.5%), the relationship is significant and holding all other factors constant, the intention to teach in FLS is a predictor of turnover intention. It has been posited in the emerging literature that the post-pandemic new normal emphasizes the continuity of flexible learning [143]. Since FLS involves both online and face-to-face, it is practical to articulate the learning management systems, update online content, and provide new learning designs for face-to-face instruction. In this manner, support for FLS can be converted to enhanced digital literacy, better job satisfaction, higher self-efficacy, and improved organizational commitment. When appropriate measures to

7. Conclusions and Future Works

FLS, and consequently, turnover intentions become minimal.

This work proposes and validates an empirical model that examines teachers' turnover intentions in HEIs regarding the implementation of FLS, especially during the post-pandemic. To explain teachers' attitudes, the TPB model has been extended to determine the variations of the intention to teach in FLS with self-efficacy and digital nativity as antecedent variables, along with job satisfaction and organizational commitment. This extended model is linked to the turnover intention of teachers and is confirmed in a case study of 417 teacher participants using PLS-SEM. Furthermore, the moderating effect of age is investigated due to the notion that FLS is highly dependent on educational technologies. The proposed model generates 12 hypotheses, and the empirical case supports 11 of them. The model provides high explanatory powers in its endogenous variables.

address these factors are in place, teachers are likely to enhance their intention to teach in

Four essential contributions are put forward in the study. First, the TPB constructs logically explain the part and overall variations of the intention to teach in FLS by about 60.9%, confirming the significant role of self-efficacy and digital nativity on the TPB constructs, with the perceived behavioral control construct contributing the highest effect ($f^2 = 0.369$). Thus, it is imperative that policy directions focus on initiatives that improve teachers' self-efficacy and digital nativity linked to enhanced perceived behavioral control. Secondly, the variations in the teachers' attitudes toward FLS explain self-efficacy, job satisfaction, and organizational commitment. The literature considers these intangible factors as the foundation of attitudinal characteristics. Specifically, the support system on the desire to implement the FLS is critical in improving efficacy beliefs, satisfaction, and commitment. The call to support strategies is more pronounced in the case country, especially on the existing challenges of IT infrastructure and Internet connectivity. The third notable finding is that age has no moderating effect on the intention to teach in FLS, affirming that there is no need to realign support strategies to different age groups. This indicates that the older age group is catching up with the younger generation of teachers in terms of developing digital tools to implement the FLS. Lastly, there is a negative relationship between the intention to teach and the intention to leave the teaching profession. This inverse relationship supports the notion that teachers' intention to teach in FLS is a predictor of turnover intention. These findings benefit education stakeholders, especially university leaders, knowing that the turnover intention can be managed if appropriate measures to support FLS are designed to enhance teachers' intention to teach.

Similar to other existing studies in this field, this study has some limitations. One is the need to have a closer look at the self-efficacy construct and a deeper understanding of different support dimensions and other facilitating conditions relevant to carrying out the FLS. Another potential constraint can be attributed to the limited geographical location of the study participants due to the observance of COVID-19 protocols during the data collection (i.e., online survey). Thus, it is suggested that different population groups (i.e., different cultural aspects, comparing countries) should be analyzed to validate and provide a more comprehensive report of the current study. Furthermore, some constructs might have inherent interdependencies with other constructs, which would make the structural model highly complex. The use of PLS-SEM could not effectively handle these complex models. Cognitive modelling tools based on graph theory, including decision-making trial and evaluation laboratory, interpretive structural modelling, and fuzzy cognitive mapping, can be implemented to uncover salient information about the intertwined relationships of the constructs.

The overall theoretical significance of the study leads to specific insights for future works. Among those, we suggest three compelling directions: (1) a deeper understanding of the variations of the extended TPB model in different periods and institution types (i.e., public or private), (2) self-efficacy can be extended with Bandura's [142] dimensions on mastery experiences and vicarious experiences, and (3) analysis can be viewed with different dimensions of organizational commitment (e.g., creativity, continuance commitment, and goal commitment).

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Appendix A. Measurement Indicators

Constructs	Code	Items	References
Self-efficacy	SE1	I can provide alternative explanations or examples when students are confused in a flexible learning environment.	
	SE2	I can implement alternative teaching strategies in a flexible learning environment.	- Skaalvik & Skaalvik [49];
	SE3	I can control the disruptive behavior of the students in a flexible learning environment.	Tschannen-moran et al. [144]; Tschannen-Moran &
	SE4	In a flexible learning environment, I can motivate students who show low interest in schoolwork.	- Hoy [145]
	SE5	In a flexible learning environment, I can get students to believe they can do well in school work.	-
Digital nativity	DN1	When I need to know something, I search the Internet first	
	DN2	I know how to utilize advanced search functions provided by search engines.	-
	DN3	I try other databases when I cannot get any information in one database.	Çoklar et al. [146]; Huang et al. [147]; Teo [148]
	DN4	I usually think about what keywords I can use in advance.	-
	DN5	I keep on evaluating the relationships among the information searched on the web.	-

Constructs	Code	Items	References
Attitude	A1	School equipment is adequate to meet the demands of the flexible learning environment.	Culver [149]
	A2	Teachers in this school have regular contact with their subject teachers in other schools.	
	A3	There is no real problem if additional materials are required for the flexible learning environment.	
	A4	The morale of the staff at our school under the flexible learning environment is high.	
	A5	In a flexible learning environment, teachers get together in small select groups	
	A6	With a flexible learning environment, the school staff is proud of the school	
Job satisfaction	JS1	If I could plan my career again, I would choose teaching, even in a flexible learning environment.	
	JS2	In a flexible learning environment, I find my contact with students, for the most part, highly satisfying and rewarding	
	JS3	I really enjoy working with my students in a flexible learning environment.	Culver [149]; Bentley & Rempel [150]
	JS4	I feel that I am an important part of this school system that implements a flexible learning environment.	
	JS5	Teaching in a flexible learning environment gives me a great deal of satisfaction.	
Organizational commitment	OC1	I am willing to put in a great deal of effort beyond what is normally expected in order to help this school successfully implement a flexible learning environment.	
	OC2	I would accept almost any type of job assignment to keep working for this school that implements a flexible learning environment.	
	OC3	In the implementation of a flexible learning environment, I find that my values and the school's values are very similar.	Mowday et al. [151]; Bozemar and Perrewé [152]
	OC4	Even under a flexible learning environment, I am extremely glad that I chose this organization to work for over others I was considering at the time I joined.	
	OC5	I am proud to tell others that I am part of the teaching profession, even in a flexible learning environment.	
Subjective norms	SN1	People who influence my behavior think I should teach in a flexible learning environment.	
	SN2	People who are important to me think I should teach in a flexible learning environment.	
	SN3	Most people who are important to me think that it would be fine to teach in a flexible learning environment.	Azjen [39]; Davis et al. [153]; Teo et al. [154]; Cheon
	SN4	I think other students in my classes would be willing to adapt to a flexible learning environment.	et al. [155]
	SN5	Most people who are important to me would favor using the tools required for implementing a flexible learning environment.	

Table A0. Cont.

Constructs	Code	Items	References
Perceived behavioral control	PBC1	I could easily pursue teaching in a flexible learning environment if I wanted to.	
	PBC2	Teaching in a flexible learning environment is entirely within my control.	Elie-Dit-Cosaque et al. [156];
	PBC3	I have control over teaching in a flexible learning environment when performing my work tasks.	Hsieh et al. [157]; Kolvereid [158]; Vamvaka
	PBC4	I have the available resources necessary to teach in a flexible learning environment	et al. [159]
	PBC5	I have the knowledge necessary to teach in a flexible learning environment.	
Intention to teach in a flexible learning environment	ITFLE1	I intend to continue teaching in a flexible learning environment to solve various problems.	
	ITFLE2	I intend to continue teaching in a flexible learning environment to justify my decisions on relevant matters.	
	ITFLE3	I intend to continue teaching in a flexible learning environment to exchange ideas with teachers and students.	Titah and Barki [160]
	ITFLE4	I intend to continue teaching in a flexible learning environment to plan or follow up on my teaching tasks.	
	ITFLE5	I intend to continue teaching in a flexible learning environment to coordinate with teachers and students.	
	ITFLE6	I intend to continue teaching in a flexible learning environment to serve the students.	
Intention to leave the teaching profession	ILTP1	With a flexible learning environment, I wish I had a different job than being a teacher.	
	ILTP2	With a flexible learning environment, if I could choose over again, I would not be a teacher.	Gonzales et al. [102]; Hackett
	ILTP3	With a flexible learning environment, I often think of leaving the teaching profession.	et al. [161]; Skaalvik and Skaalvik [26,162]
	ILTP4	With a flexible learning environment, I intend to quit the teaching profession.	
	ILTP5	With a flexible learning environment, I intend to search for another job.	

Table A0. Cont.

References

- Akat, M.; Karataş, K. Psychological effects of COVID-19 pandemic on society and its reflections on education. *Electron. Turk. Stud.* 2020, 15, 1–13.
- Zhang, M.; Tlili, A.; Zhuang, R.; Yang, J.; Chang, T.W.; Wang, H.; Huang, R. Chinese experience of providing remote and flexible learning during COVID-19 pandemic: A case study of maintaining education in crisis contexts. In *Radical Solutions for Education in a Crisis Context*; Springer: Singapore, 2021; pp. 243–253.
- 3. Demetriadis, S.; Pombortsis, A. E-lectures for flexible learning: A study on their learning efficiency. J. Educ. Technol. Soc. 2007, 10, 147–157.
- 4. Tarrayo, V.N.; Paz, R.M.O.; Gepila, E.C., Jr. The shift to flexible learning amidst the pandemic: The case of English language teachers in a Philippine state university. *Innov. Lang. Learn. Teach.* **2021**. [CrossRef]
- 5. Santiago, C.J.; Ulanday, M.L.; Centeno, Z.J.; Bayla, M.C.; Callanta, J. Flexible learning adaptabilities in the new normal: E-learning resources, digital meeting platforms, online Learning Systems and Learning Engagement. *Asian J. Distance Educ.* **2021**, *16*, 38–56.

- Jakkaew, P.; Hemrungrote, S. The use of UTAUT2 model for understanding student perceptions using Google classroom: A case study of introduction to information technology course. In Proceedings of the 2017 International Conference on Digital Arts, Media and Technology (ICDAMT), Chiang Mai, Thailand, 1–4 March 2017; pp. 205–209.
- Kumar, J.A.; Bervell, B.; Osman, S. Google classroom: Insights from Malaysian higher education students' and instructors' experiences. *Educ. Inf. Technol.* 2020, 25, 4175–4195. [CrossRef]
- 8. Ali, S.; Sarker, M.F.H.; Islam, M.S.; Islam, M.K.; Al Mahmud, R. Pursuing higher education: Adaptation challenges and coping strategies of rural students at urban universities in Bangladesh. *Tert. Educ. Manag.* 2021, 27, 91–106. [CrossRef]
- 9. Northey, G.; Bucic, T.; Chylinski, M.; Govind, R. Increasing student engagement using asynchronous learning. *J. Mark. Educ.* 2015, 37, 171–180. [CrossRef]
- Ramadan, R. Unravelling Facebook: A pedagogical tool during the Syrian crisis. Open Learn. J. Open Distance e-Learn. 2017, 32, 196–213. [CrossRef]
- 11. Barrot, J.S. Effects of Facebook-based e-portfolio on ESL learners' writing performance. *Lang. Cult. Curric.* **2021**, *34*, 95–111. [CrossRef]
- Walraven, A.; Brand-Gruwel, S.; Boshuizen, H. Fostering students' evaluation behaviour while searching the internet. *Instr. Sci.* 2013, 41, 125–146. [CrossRef]
- 13. Mishra, S.; Mehran, B.; Sahu, P.K. Assessment of delivery models for semi-flexible transit operation in low-demand conditions. *Transp. Policy* **2020**, *99*, 275–287. [CrossRef]
- 14. Barrot, J.S.; Llenares, I.I.; del Rosario, L.S. Students' online learning challenges during the pandemic and how they cope with them: The case of the Philippines. *Educ. Inf. Technol.* **2021**, *26*, 7321–7338. [CrossRef]
- 15. Cardona, M.C.; Buan, A.T.; Inutan, E.D. Teachers' Perspective of Science Flexible Learning. Asia Res. Netw. J. Educ. 2022, 2, 1–16.
- 16. Frelin, A.; Grannäs, J. Teachers' pre-occupancy evaluation of affordances in a multi-zone flexible learning environment– introducing an analytical model. *Pedagog. Cult. Soc.* **2022**, *30*, 243–259. [CrossRef]
- 17. Ingersoll, R.M. Teacher turnover and teacher shortages: An organizational analysis. Am. Educ. Res. J. 2001, 38, 499–534. [CrossRef]
- Goldhaber, D.; Gross, B.; Player, D. Are Public Schools Really Losing Their Best? Assessing the Career Transitions of Teachers and Their Implications for the Quality of the Teacher Workforce. Working Paper 12. In *National Center for Analysis of Longitudinal Data in Education Research*; The Urban Institute: Washington, DC, USA, 2007.
- 19. Moynihan, D.P.; Pandey, S.K. The ties that bind: Social networks, person–organization value fit, and turnover intention. *J. Public Adm. Res. Theory* 2007, *18*, 205–227. [CrossRef]
- Li, R.; Yao, M. What promotes teachers' turnover intention? Evidence from a meta-analysis. *Educ. Res. Rev.* 2022, 37, 100477. [CrossRef]
- Dayal, H.C.; Tiko, L. When are we going to have the real school? A case study of early childhood education and care teachers' experiences surrounding education during the COVID-19 pandemic. *Australas. J. Early Child.* 2020, 45, 336–347. [CrossRef]
- 22. Costan, E.; Gonzales, G.; Gonzales, R.; Enriquez, L.; Costan, F.; Suladay, D.; Ocampo, L. Education 4.0 in developing economies: A systematic literature review of implementation barriers and future research agenda. *Sustainability* **2021**, *13*, 12763. [CrossRef]
- Chou, H.L.; Chou, C. A multigroup analysis of factors underlying teachers' technostress and their continuance intention toward online teaching. *Comput. Educ.* 2021, 175, 104335. [CrossRef]
- Hom, P.W.; Griffeth, R.W.; Sellaro, C.L. The validity of Mobley's (1977) model of employee turnover. *Organ. Behav. Hum. Perform.* 1984, 34, 141–174. [CrossRef]
- Tett, R.P.; Meyer, J.P. Job satisfaction, organizational commitment, turnover intention, and turnover: Path analyses based on meta-analytic findings. *Pers. Psychol.* 1993, 46, 259–293. [CrossRef]
- 26. Skaalvik, E.M.; Skaalvik, S. Motivated for teaching? Associations with school goal structure, teacher self-efficacy, job satisfaction and emotional exhaustion. *Teach. Teach. Educ.* 2017, 67, 152–160. [CrossRef]
- Skaalvik, E.M.; Skaalvik, S. Does school context matter? Relations with teacher burnout and job satisfaction. *Teach. Teach. Educ.* 2009, 25, 518–524. [CrossRef]
- 28. Gu, Q.; Day, C. Teachers resilience: A necessary condition for effectiveness. Teach. Teach. Educ. 2007, 23, 1302–1316. [CrossRef]
- Kunter, M.; Frenzel, A.; Nagy, G.; Baumert, J.; Pekrun, R. Teacher enthusiasm: Dimensionality and context specificity. *Contemp. Educ. Psychol.* 2011, 36, 289–301. [CrossRef]
- 30. Lee, Y.H. Emotional labor, teacher burnout, and turnover intention in high-school physical education teaching. *Eur. Phys. Educ. Rev.* **2019**, *25*, 236–253. [CrossRef]
- Aloe, A.M.; Amo, L.C.; Shanahan, M.E. Classroom management self-efficacy and burnout: A multivariate meta-analysis. *Educ. Psychol. Rev.* 2014, 26, 101–126. [CrossRef]
- 32. Hanushek, E.A.; Kain, J.F.; Rivkin, S.G. Why public schools lose teachers. J. Hum. Resour. 2004, 39, 326–354. [CrossRef]
- 33. Burke, P.F.; Schuck, S.; Aubusson, P.; Buchanan, J.; Louviere, J.J.; Prescott, A. Why do early career teachers choose to remain in the profession? The use of best–worst scaling to quantify key factors. *Int. J. Educ. Res.* **2013**, *62*, 259–268. [CrossRef]
- 34. Matsuoka, R. School socioeconomic context and teacher job satisfaction in Japanese compulsory education. *Educ. Stud. Jpn.* 2015, 9, 41–54. [CrossRef]
- Kim, H.; Stoner, M. Burnout and turnover intention among social workers: Effects of role stress, job autonomy and social support. *Adm. Soc. Work* 2008, 32, 5–25. [CrossRef]

- 36. Carver-Thomas, D.; Darling-Hammond, L. The trouble with teacher turnover: How teacher attrition affects students and schools. *Educ. Policy Anal. Arch.* **2019**, *27*, 36. [CrossRef]
- 37. Gagné, M.; Deci, E.L. Self-determination theory and work motivation. J. Organ. Behav. 2005, 26, 331–362. [CrossRef]
- 38. Fishbein, M. A theory of reasoned action: Some applications and implications. Neb. Symp. Motiv. 1979, 27, 65–116.
- 39. Ajzen, I. The theory of planned behavior. Organ. Behav. Hum. Decis. Process. 1991, 50, 179–211. [CrossRef]
- 40. Kim, S.Y.; Fernandez, S. Employee empowerment and turnover intention in the US federal bureaucracy. *Am. Rev. Public Adm.* **2017**, 47, 4–22. [CrossRef]
- Zhao, Y.; Wang, H.; Sun, D.; Ma, D.; Li, H.; Li, Y.; Sun, J. Job satisfaction, resilience and social support in relation to nurses' turnover intention based on the theory of planned behaviour: A structural equation modelling approach. *Int. J. Nurs. Pract.* 2021, 27, 12941. [CrossRef]
- 42. Ajzen, I. Attitudes, Personality, and Behavior; Dorsey: Chicago, IL, USA, 1988.
- 43. Bright, A.D.; Manfredo, M.J.; Fishbein, M.; Bath, A. Application of the theory of reasoned action to the National Park Service's controlled burn policy. *J. Leis. Res.* **1993**, *25*, 263–280. [CrossRef]
- 44. Conner, M.; Armitage, C.J. Extending the theory of planned behavior: A review and avenues for further research. *J. Appl. Soc. Psychol.* **1998**, *28*, 1429–1464. [CrossRef]
- 45. Çoklar, A.N.; Tatli, A. Examining the Digital Nativity Levels of Digital Generations: From Generation X to Generation Z. *Shanlax Int. J. Educ.* **2021**, *9*, 433–444. [CrossRef]
- 46. Shonfeld, M.; Aharony, N.; Nadel-Kritz, N. Teachers' perceived information literacy self-efficacy. *J. Librariansh. Inf. Sci.* 2022, 54, 494–507. [CrossRef]
- 47. Skaalvik, E.M.; Skaalvik, S. Teacher self-efficacy and perceived autonomy: Relations with teacher engagement, job satisfaction, and emotional exhaustion. *Psychol. Rep.* **2014**, *114*, 68–77. [CrossRef]
- 48. Weiqi, C. The structure of secondary school teacher job satisfaction and its relationship with attrition and work enthusiasm. *Chin. Educ. Soc.* **2007**, *40*, 17–31. [CrossRef]
- 49. Skaalvik, E.M.; Skaalvik, S. Teacher self-efficacy and teacher burnout: A study of relations. *Teach. Teach. Educ.* **2010**, *26*, 1059–1069. [CrossRef]
- 50. Jaworski, C.; Ravichandran, S.; Karpinski, A.C.; Singh, S. The effects of training satisfaction, employee benefits, and incentives on part-time employees' commitment. *Int. J. Hosp. Manag.* **2018**, *74*, 1–12. [CrossRef]
- 51. Jimenez, E. Emotional quotient, work attitude and teaching performance of secondary school teachers. *J. Pedagog. Sociol. Psychol.* **2020**, *2*, 25–35. [CrossRef]
- 52. Meyer, J. Workforce age and technology adoption in small and medium-sized service firms. *Small Bus. Econ.* **2011**, *37*, 305–324. [CrossRef]
- 53. Hill, J.R. Flexible learning environments: Leveraging the affordances of flexible delivery and flexible learning. *Innov. High. Educ.* **2006**, *31*, 187–197. [CrossRef]
- 54. Brand-Gruwel, S.; Kester, L.; Kicken, W.; Kirschner, P.A. Learning ability development in flexible learning environments. In *Handbook of Research on Educational Communications and Technology;* Springer: New York, NY, USA, 2014; pp. 363–372.
- 55. Kicken, W.; Brand-Gruwel, S.; Van Merriënboer, J.J.; Slot, W. The effects of portfolio-based advice on the development of self-directed learning skills in secondary vocational education. *Educ. Technol. Res. Dev.* **2009**, *57*, 439–460. [CrossRef]
- Müller, C.; Stahl, M.; Alder, M.; Müller, M. Learning Effectiveness and Students' Perceptions in a Flexible Learning Course. Eur. J. Open Distance E-Learn. 2018, 21, 44–53. [CrossRef]
- 57. Yeoman, P.; Wilson, S. Designing for situated learning: Understanding the relations between material properties, designed form and emergent learning activity. *Br. J. Educ. Technol.* **2019**, *50*, 2090–2108. [CrossRef]
- 58. University of British Columbia. Flexible Learning; University of British Columbia: Vancouver, BC, Canada, 2020.
- 59. Kariippanon, K.E.; Cliff, D.P.; Okely, A.D.; Parrish, A.M. The 'why'and 'how'of flexible learning spaces: A complex adaptive systems analysis. *J. Educ. Chang.* 2020, *21*, 569–593. [CrossRef]
- 60. Cleveland, B. Addressing the spatial to catalyse socio-pedagogical reform in middle years education. In *The Translational Design of Schools*; Springer: Berlin/Heidelberg, Germany, 2016; pp. 27–49.
- 61. Deed, C.; Blake, D.; Henriksen, J.; Mooney, A.; Prain, V.; Tytler, R.; Fingland, D. Teacher adaptation to flexible learning environments. *Learn. Environ. Res.* 2020, 23, 153–165. [CrossRef]
- 62. Kariippanon, K.E.; Cliff, D.P.; Lancaster, S.L.; Okely, A.D.; Parrish, A.M. Perceived interplay between flexible learning spaces and teaching, learning and student wellbeing. *Learn. Environ. Res.* **2018**, *21*, 301–320. [CrossRef]
- 63. Zeid, H.A.; Assadi, N.; Murad, T. The effect of junior high school teachers' motivation and willingness to change on the diversity of their teaching methods. *Theory Pract. Lang. Stud.* 2017, 7, 1160–1170. [CrossRef]
- 64. Müller, C.; Mildenberger, T. Facilitating flexible learning by replacing classroom time with an online learning environment: A systematic review of blended learning in higher education. *Educ. Res. Rev.* **2021**, *34*, 100394. [CrossRef]
- 65. Qadach, M.; Schechter, C.; Da'as, R.A. Instructional leadership and teachers' intent to leave: The mediating role of collective teacher efficacy and shared vision. *Educ. Manag. Adm. Leadersh.* **2020**, *48*, 617–634. [CrossRef]
- Rosa, A.T.R. Teacher Development Potential (Creativity and Innovation) Education Management in Engineering Training, Coaching and Writing Works through Scientific Knowledge Intensive Knowledge Based on Web Research in the Industrial Revolution and Society. Int. J. High. Educ. 2020, 9, 161–168. [CrossRef]

- 67. Zhang, W.; Wang, Y.; Yang, L.; Wang, C. Suspending classes without stopping learning: China's education emergency management policy in the COVID-19 outbreak. *J. Risk Financ. Manag.* **2020**, *13*, 55. [CrossRef]
- 68. Räsänen, K.; Pietarinen, J.; Pyhältö, K.; Soini, T.; Väisänen, P. Why leave the teaching profession? A longitudinal approach to the prevalence and persistence of teacher turnover intentions. *Soc. Psychol. Educ.* **2020**, *23*, 837–859. [CrossRef]
- Grant, A.A.; Jeon, L.; Buettner, C.K. Relating early childhood teachers' working conditions and well-being to their turnover intentions. *Educ. Psychol.* 2019, 39, 294–312. [CrossRef]
- 70. Li, Z.; Yu, Z.; Huang, S.S.; Zhou, J.; Yu, M.; Gu, R. The effects of psychological capital, social capital, and human capital on hotel employees' occupational stress and turnover intention. *Int. J. Hosp. Manag.* **2021**, *98*, 103046. [CrossRef]
- Karatepe, O.M.; Avci, T. The effects of psychological capital and work engagement on nurses' lateness attitude and turnover intentions. J. Manag. Dev. 2017, 36, 1029–1039. [CrossRef]
- 72. McInerney, D.M.; Ganotice, F.A., Jr.; King, R.B.; Marsh, H.W.; Morin, A.J. Exploring commitment and turnover intentions among teachers: What we can learn from Hong Kong teachers. *Teach. Teach. Educ.* **2015**, *52*, 11–23. [CrossRef]
- Ajzen, I. From Intentions to Actions: A Theory of Planned Behavior. In Action Control; Springer: Berlin/Heidelberg, Germany, 1985; pp. 11–39.
- 74. Greaves, M.; Zibarras, L.D.; Stride, C. Using the theory of planned behavior to explore environmental behavioral intentions in the workplace. *J. Environ. Psychol.* 2013, 34, 109–120. [CrossRef]
- Ajzen, I.; Madden, T.J. Prediction of goal-directed behavior: Attitudes, intentions, and perceived behavioral control. J. Exp. Soc. Psychol. 1986, 22, 453–474. [CrossRef]
- 76. Ajzen, I.; Manstead, A.S. Changing health-related behaviours: An approach based on the theory of planned behaviour. In *The Scope of Social Psychology*; Psychology Press: London, UK, 2007; pp. 55–76.
- 77. Sadaf, A.; Gezer, T. Exploring factors that influence teachers' intentions to integrate digital literacy using the decomposed theory of planned behavior. *J. Digit. Learn. Teach. Educ.* **2020**, *36*, 124–145. [CrossRef]
- 78. Torlak, N.G.; Kuzey, C.; Sait Dinç, M.; Budur, T. Links connecting nurses' planned behavior, burnout, job satisfaction, and organizational citizenship behavior. *J. Workplace Behav. Health* **2021**, *36*, 77–103. [CrossRef]
- Watson, J.H.; Rockinson-Szapkiw, A. Predicting preservice teachers' intention to use technology-enabled learning. *Comput. Educ.* 2021, 168, 104207. [CrossRef]
- 80. Uzun, A.M.; Kilis, S. Investigating antecedents of plagiarism using extended theory of planned behavior. *Comput. Educ.* **2020**, 144, 103700. [CrossRef]
- Oteng-Peprah, M.; De Vries, N.; Acheampong, M.A. Households' willingness to adopt greywater treatment technologies in a developing country–Exploring a modified theory of planned behaviour (TPB) model including personal norm. *J. Environ. Manag.* 2020, 254, 109807. [CrossRef] [PubMed]
- Kesharwani, A. Do (how) digital natives adopt a new technology differently than digital immigrants? A longitudinal study. *Inf. Manag.* 2020, 57, 103170. [CrossRef]
- 83. Arnold, J.; Loan-Clarke, J.; Coombs, C.; Wilkinson, A.; Park, J.; Preston, D. How well can the theory of planned behavior account for occupational intentions? *J. Vocat. Behav.* 2006, *69*, 374–390. [CrossRef]
- 84. Bandura, A. Exercise of personal and collective efficacy in changing societies. Self-Effic. Chang. Soc. 1995, 15, 334.
- 85. Pajares, F. Self-efficacy during childhood and adolescence. Self-Effic. Beliefs Adolesc. 2006, 5, 117–137.
- 86. Thurm, D.; Barzel, B. Effects of a professional development program for teaching mathematics with technology on teachers' beliefs, self-efficacy and practices. ZDM **2020**, *52*, 1411–1422. [CrossRef]
- 87. Warren, L.; Reilly, D.; Herdan, A.; Lin, Y. Self-efficacy, performance and the role of blended learning. J. Appl. Res. High. Educ. 2020, 13, 98–111. [CrossRef]
- Morris, D.B.; Usher, E.L.; Chen, J.A. Reconceptualizing the sources of teaching self-efficacy: A critical review of emerging literature. *Educ. Psychol. Rev.* 2017, 29, 795–833. [CrossRef]
- Rahim, A.; Cosby, D.M. A model of workplace incivility, job burnout, turnover intentions, and job performance. J. Manag. Dev. 2016, 35, 1255–1265. [CrossRef]
- 90. Kuyini, A.B.; Desai, I.; Sharma, U. Teachers' self-efficacy beliefs, attitudes and concerns about implementing inclusive education in Ghana. *Int. J. Incl. Educ.* 2020, 24, 1509–1526. [CrossRef]
- Cigdem, H.; Topcu, A. Predictors of instructors' behavioral intention to use learning management system: A Turkish vocational college example. *Comput. Hum. Behav.* 2015, 52, 22–28. [CrossRef]
- 92. Binyamin, S.S.; Rutter, M.J.; Smith, S. The influence of computer self-efficacy and subjective norms on the students' use of learning management systems at King Abdulaziz University. *Int. J. Inf. Educ. Technol.* **2018**, *8*, 693–699. [CrossRef]
- 93. Doanh, D.C.; Bernat, T. Entrepreneurial self-efficacy and intention among Vietnamese students: A meta-analytic path analysis based on the theory of planned behavior. *Procedia Comput. Sci.* 2019, 159, 2447–2460. [CrossRef]
- 94. Youn, S.Y.; Lee, J.E.; Ha-Brookshire, J. Fashion consumers' channel switching behavior during the COVID-19: Protection motivation theory in the extended planned behavior framework. *Cloth. Text. Res. J.* **2021**, *39*, 139–156. [CrossRef]
- 95. Prensky, M. Digital natives, digital immigrants part 2: Do they really think differently? On the horizon 2001, 9, 120. [CrossRef]
- 96. Huang, Y.T.; Liu, H.; Huang, L. How transformational and contingent reward leaderships influence university faculty's organizational commitment: The mediating effect of psychological empowerment. *Stud. High. Educ.* **2021**, *46*, 2473–2490. [CrossRef]

- 97. Kirschner, P.A.; De Bruyckere, P. The myths of the digital native and the multitasker. *Teach. Teach. Educ.* **2017**, *67*, 135–142. [CrossRef]
- Gretter, S.; Yadav, A. What Do Preservice Teachers Think about Teaching Media Literacy? An Exploratory Study Using the Theory of Planned Behavior. J. Media Lit. Educ. 2018, 10, 104–123. [CrossRef]
- 99. Milutinović, V. Examining the influence of pre-service teachers' digital native traits on their technology acceptance: A Serbian perspective. *Educ. Inf. Technol.* 2022, 27, 6483–6511. [CrossRef]
- 100. Locke, E.A. The Nature and Causes of Job Satisfaction. In *Handbook of Industrial and Organizational Psychology*; Rand McNally: Chicago, IL, USA, 1976.
- Davidescu, A.A.; Apostu, S.A.; Paul, A.; Casuneanu, I. Work flexibility, job satisfaction, and job performance among Romanian employees—Implications for sustainable human resource management. *Sustainability* 2020, 12, 6086. [CrossRef]
- 102. Gonzales, G.; Gonzales, R.; Costan, F.; Himang, C. Dimensions of motivation in teaching: Relations with social support climate, teacher efficacy, emotional exhaustion, and job satisfaction. *Educ. Res. Int.* **2020**, 2020, 8820259. [CrossRef]
- 103. Cherian, J.; Gaikar, V.; Paul, R.; Pech, R. Corporate culture and its impact on employees' attitude, performance, productivity, and behavior: An investigative analysis from selected organizations of the United Arab Emirates (UAE). J. Open Innov. Technol. Mark. Complex. 2021, 7, 45. [CrossRef]
- 104. Meyer, J.P.; Allen, N.J. Links between work experiences and organizational commitment during the first year of employment: A longitudinal analysis. *J. Occup. Psychol.* **1988**, *61*, 195–209. [CrossRef]
- Porter, L.W.; Steers, R.M.; Mowday, R.T.; Boulian, P.V. Organizational Commitment, Job Satisfaction, and Turnover Among Psychiatric Technicians. J. Appl. Psychol. 1974, 59, 603–609. [CrossRef]
- 106. Uddin, M.A.; Mahmood, M.; Fan, L. Why individual employee engagement matters for team performance? Mediating effects of employee commitment and organizational citizenship behaviour. *Team Perform. Manag. Int. J.* **2018**, 25, 47–68. [CrossRef]
- 107. Straatmann, T.; Nolte, J.K.; Seggewiss, B.J. Psychological processes linking organizational commitment and change-supportive intentions. *Pers. Rev.* 2018, 47, 403–424. [CrossRef]
- 108. Yousef, D.A. Organizational commitment, job satisfaction and attitudes toward organizational change: A study in the local government. *Int. J. Public Adm.* 2017, 40, 77–88. [CrossRef]
- 109. Allport, G.W. Attitudes. In *Handbook of Social Psychology*; Murchison, C., Ed.; Clark University Press: Worcester, MA, USA, 1935; Volume 2, pp. 798–884.
- 110. Cropanzano, R.; James, K.; Konovsky, M.A. Dispositional affectivity as a predictor of work attitudes and job performance. *J. Organ. Behav.* **1993**, *14*, 595–606. [CrossRef]
- 111. Güneyli, A.; Aslan, C. Evaluation of Turkish prospective teachers' attitudes towards teaching profession (Near East University case). *Procedia Soc. Behav. Sci.* 2009, *1*, 313–319. [CrossRef]
- 112. Barak, M. Are digital natives open to change? Examining flexible thinking and resistance to change. *Comput. Educ.* 2018, 121, 115–123. [CrossRef]
- 113. Midthassel, U.V. Teacher involvement in school development activity and its relationships to attitudes and subjective norms among teachers: A study of Norwegian elementary and junior high school teachers. *Educ. Adm. Q.* 2004, 40, 435–456. [CrossRef]
- Kam, C.C.S.; Hue, M.T.; Cheung, H.Y. Academic dishonesty among Hong Kong secondary school students: Application of theory of planned behaviour. *Educ. Psychol.* 2018, 38, 945–963. [CrossRef]
- 115. Li, Y.; Garza, V.; Keicher, A.; Popov, V. Predicting high school teacher use of technology: Pedagogical beliefs, technological beliefs and attitudes, and teacher training. *Technol. Knowl. Learn.* **2019**, *24*, 501–518. [CrossRef]
- 116. Huang, R.; Spector, J.M.; Yang, J. Educational Technology a Primer for the 21st Century; Springer: Berlin/Heidelberg, Germany, 2019.
- 117. Sadaf, A.; Newby, T.J.; Ertmer, P.A. Exploring pre-service teachers' beliefs about using Web 2.0 technologies in K-12 classroom. *Comput. Educ.* **2012**, *59*, 937–945. [CrossRef]
- 118. Rizun, M.; Strzelecki, A. Students' acceptance of the COVID-19 impact on shifting higher education to distance learning in Poland. *Int. J. Environ. Res. Public Health* **2020**, 17, 6468. [CrossRef]
- 119. Benade, L. Flexible learning spaces: Inclusive by design? N. Z. J. Educ. Stud. 2019, 54, 53–68. [CrossRef]
- 120. Cardellino, P.; Woolner, P. Designing for transformation–a case study of open learning spaces and educational change. *Pedagog. Cult. Soc.* **2020**, *28*, 383–402. [CrossRef]
- 121. Imms, W.; Byers, T. Impact of classroom design on teacher pedagogy and student engagement and performance in mathematics. *Learn. Environ. Res.* 2017, 20, 139–152. [CrossRef]
- 122. Boamah, S.A.; Hamadi, H.Y.; Havaei, F.; Smith, H.; Webb, F. Striking a Balance between Work and Play: The Effects of Work–Life Interference and Burnout on Faculty Turnover Intentions and Career Satisfaction. *Int. J. Environ. Res. Public Health* **2022**, *19*, 809. [CrossRef]
- Masanet, M.J.; Guerrero-Pico, M.; Establés, M.J. From digital native to digital apprentice. A case study of the transmedia skills and informal learning strategies of adolescents in Spain. *Learn. Media Technol.* 2019, 44, 400–413. [CrossRef]
- 124. Chung, J.E.; Park, N.; Wang, H.; Fulk, J.; McLaughlin, M. Age differences in perceptions of online community participation among non-users: An extension of the Technology Acceptance Model. *Comput. Hum. Behav.* **2010**, *26*, 1674–1684. [CrossRef]
- 125. Rodríguez-Cifuentes, F.; Farfán, J.; Topa, G. Older worker identity and job performance: The moderator role of subjective age and self-efficacy. *Int. J. Environ. Res. Public Health* **2018**, *15*, 2731. [CrossRef] [PubMed]

- 126. Betts, L.R.; Hill, R.; Gardner, S.E. There's not enough knowledge out there: Examining older adults' perceptions of digital technology use and digital inclusion classes. *J. Appl. Gerontol.* **2019**, *38*, 1147–1166. [CrossRef] [PubMed]
- 127. Tanas, L.; Winkowska-Nowak, K.; Pobiega, K. The importance of teachers' need for cognition in their use of technology in mathematics instruction. *Front. Psychol.* **2020**, *11*, 259. [CrossRef]
- 128. Skaalvik, E.M.; Skaalvik, S. Teacher burnout: Relations between dimensions of burnout, perceived school context, job satisfaction and motivation for teaching. A longitudinal study. *Teach. Teach.* 2020, 26, 602–616. [CrossRef]
- Ford, T.G.; Olsen, J.; Khojasteh, J.; Ware, J.; Urick, A. The effects of leader support for teacher psychological needs on teacher burnout, commitment, and intent to leave. J. Educ. Adm. 2019, 57, 615–634. [CrossRef]
- Henseler, J.; Ringle, C.M.; Sarstedt, M. A new criterion for assessing discriminant validity in variance-based structural equation modeling. J. Mark. Sci. 2015, 43, 115–135. [CrossRef]
- 131. Hair, J.F., Jr.; Sarstedt, M.; Ringle, C.M.; Gudergan, S.P. *Advanced Issues in Partial Least Squares Structural Equation Modeling*; SAGE Publications: New York, NY, USA, 2017.
- Fornell, C.; Bookstein, F.L. Two structural equation models: LISREL and PLS applied to consumer exit-voice theory. J. Mark. Res. 1982, 19, 440–452. [CrossRef]
- 133. Henseler, J.; Ringle, C.M.; Sinkovics, R.R. The use of partial least squares path modeling in international marketing. In *New Challenges to International Marketing*; Emerald Group Publishing: Bingley, UK, 2009; Volume 20, pp. 277–319.
- Fornell, C.; Larcker, D.F. Evaluating structural equation models with unobservable variables and measurement error. *J. Mark. Res.* 1981, 18, 39–50. [CrossRef]
- Hair, J.F., Jr.; Sarstedt, M.; Hopkins, L.; Kuppelwieser, V.G. Partial least squares structural equation modeling (PLS-SEM): An emerging tool in business research. *Eur. Bus. Rev.* 2014, 26, 06–121.
- 136. Hair, J.F., Jr.; Ringle, C.M.; Sarstedt, M. PLS-SEM: Indeed a silver bullet. J. Mark. Theory Pract. 2011, 19, 139–152. [CrossRef]
- 137. Cohen, E. Relational and identity processes in communication: A contextual and meta-analytical review of communication accommodation theory. *Commun. Yearb.* 2014, *38*, 131–168.
- 138. Hult, G.T.M.; Hair, J.F., Jr.; Proksch, D.; Sarstedt, M.; Pinkwart, A.; Ringle, C.M. Addressing endogeneity in international marketing applications of partial least squares structural equation modeling. *J. Int. Mark.* **2018**, *26*, 1–21. [CrossRef]
- 139. Park, S.; Gupta, S. Handling endogenous regressors by joint estimation using copulas. Mark. Sci. 2012, 31, 567–586. [CrossRef]
- 140. Judge, T.A.; Weiss, H.M.; Kammeyer-Mueller, J.D.; Hulin, C.L. Job attitudes, job satisfaction, and job affect: A century of continuity and of change. *J. Appl. Psychol.* **2017**, *102*, 356. [CrossRef]
- Van der Heijden, B.I.; Peeters, M.C.; Le Blanc, P.M.; Van Breukelen, J.W.M. Job characteristics and experience as predictors of occupational turnover intention and occupational turnover in the European nursing sector. *J. Vocat. Behav.* 2018, 108, 108–120. [CrossRef]
- 142. Bandura, A. Self-Efficacy. The Exercise of Control, New York: W H. Freeman Co. Stud. Success 1997, 333, 48461.
- 143. Alraouf, A.A. The new normal or the forgotten normal: Contesting COVID-19 impact on contemporary architecture and urbanism. *Int. J. Archit. Res.* **2021**, *15*, 167–188. [CrossRef]
- 144. Tschannen-Moran, M.; Hoy, A.W. The differential antecedents of self-efficacy beliefs of novice and experienced teachers. *Teach. Teach. Educ.* **2007**, 23, 944–956. [CrossRef]
- 145. Tschannen-Moran, M.; Woolfolk Hoy, A. Teacher efficacy: Capturing an elusive concept. *Teach. Teach. Educ.* **2001**, *17*, 783–805. [CrossRef]
- Çoklar, A.N.; Yaman, N.D.; Yurdakul, I.K. Information literacy and digital nativity as determinants of online information search strategies. *Comput. Hum. Behav.* 2017, 70, 1–9. [CrossRef]
- 147. Huang, F.; Teo, T.; He, J. Digital nativity of university teachers in China: Factor structure and measurement invariance of the Digital Native Assessment Scale (DNAS). *Interact. Learn. Environ.* **2021**, *29*, 385–399. [CrossRef]
- 148. Teo, T. An initial development and validation of a Digital Natives Assessment Scale (DNAS). *Comput. Educ.* **2013**, *67*, 51–57. [CrossRef]
- 149. Culver, S. Testing a Model of Teacher Satisfaction for Blacks and Whites. Am. Educ. Res. J. 1990, 27, 323–349. [CrossRef]
- 150. Bentley, R.R. Manual for the Purdue Teacher Opinionnaire; Purdue Research Foundation: West Lafayette, IN, USA, 1980.
- 151. Mowday, R.T.; Steers, R.M.; Porter, L.W. The measurement of organizational commitment. J. Vocat. Behav. 1979, 14, 224–247. [CrossRef]
- 152. Bozeman, D.P.; Perrewé, P.L. The effect of item content overlap on Organizational Commitment Questionnaire–turnover cognitions relationships. *J. Appl. Psychol.* 2001, *86*, 161. [CrossRef] [PubMed]
- 153. Davis, F.D.; Bagozzi, R.P.; Warshaw, P.R. User acceptance of computer technology: A comparison of two theoretical models. *Manag. Sci.* **1989**, *35*, 982–1003. [CrossRef]
- 154. Teo, T.; Zhou, M.; Noyes, J. Teachers and technology: Development of an extended theory of planned behavior. *Educ. Technol. Res. Dev.* **2016**, *64*, 1033–1052. [CrossRef]
- Cheon, J.; Lee, S.; Crooks, S.M.; Song, J. An investigation of mobile learning readiness in higher education based on the theory of planned behavior. *Comput. Educ.* 2012, 59, 1054–1064. [CrossRef]
- 156. Elie-Dit-Cosaque, C.; Pallud, J.; Kalika, M. The influence of individual, contextual, and social factors on perceived behavioral control of information technology: A field theory approach. *J. Manag. Inf. Syst.* **2011**, *28*, 201–234. [CrossRef]

- 157. Hsieh, J.P.A.; Rai, A.; Keil, M. Understanding digital inequality: Comparing continued use behavioral models of the socioeconomically advantaged and disadvantaged. *MIS Q.* **2008**, *32*, 97–126. [CrossRef]
- 158. Kolvereid, L. Prediction of employment status choice intentions. Entrep. Theory Pract. 1996, 21, 47–57. [CrossRef]
- 159. Vamvaka, V.; Stoforos, C.; Palaskas, T.; Botsaris, C. Attitude toward entrepreneurship, perceived behavioral control, and entrepreneurial intention: Dimensionality, structural relationships, and gender differences. J. Innov. Entrep. 2020, 9, 5. [CrossRef]
- 160. Titah, R.; Barki, H. Nonlinearities between attitude and subjective norms in information technology acceptance: A negative synergy? *MIS Q.* 2009, 33, 827–844. [CrossRef]
- 161. Hackett, D.; Laurent, M.; Peter, A. Understanding the links between work commitment constructs. J. Vocat. Behav. 2001, 58, 392–413. [CrossRef]
- 162. Skaalvik, E.M.; Skaalvik, S. Teacher stress and teacher self-efficacy as predictors of engagement, emotional exhaustion, and motivation to leave the teaching profession. *Creat. Educ.* **2016**, *7*, 1785. [CrossRef]