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The Acceptance of Online Continuous Professional Development (CPD) among Remedial Education Teachers in Pahang, Malaysia

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Abstract: This concept paper aims to study and understand better the Special Remedial teachers' acceptance of online continuous professional development in Pahang, Malaysia. This study is based on Technological Acceptance Model, and six predictors are chosen. This correlational study will involve a minimum of 215 samples that will be selected using simple random sampling.

Keywords: online continuous professional development, technology acceptance, special remedial teachers

1. Introduction

The Malaysian Ministry of Education (MOE) has a long history of combating literacy and numeracy issues in our education system. In Malaysia, a Special Remedial Program (SRP) is available for level 1 primary school students who have difficulty mastering the 3R's (reading, writing, and arithmetic) complex skills due to environmental factors (Kasran et al., 2012), such as the pandemic we are currently facing. It is taught by Special Remedial teachers (SRT) in Malaysian primary schools and focuses on remedial Bahasa Melayu and remedial Math.

However, SRP still requires attention and improvement because of the need for professional development of remedial teachers in Malaysia (Kasran et al., 2012). It is found that teachers need appropriate techniques to create teaching materials that are easy to understand and follow by level 1 students (Ahmad Saifudin & Hamzah, 2021). Hence, teachers have adopted continuous professional development (CPD) through various digital educational platforms such as Moodle, Zoom, Google Classroom, and Edmodo, which will allow them to keep updated about the latest issues of English teaching through discussing and sharing problems and solutions with other teachers (Magdaminkhodjaevna et al., 2020).

Online continuous professional development is the systematic maintenance, improvement and broadening of knowledge, understanding and skills, and the development of personal qualities necessary for executing professional duties throughout the individual's working life that is done online either synchronously or asynchronously. In keeping with the twenty-first century, advanced information and communication technologies have made it easier for Malaysian teachers to access online professional development at any time and from any location, such as the Open Learning Website. Open Education Resources (OER), e-*Pembelajaran Sektor Awam* (EPSA), and e-*Pembelajaran Melaka* Autonomous Blended Learning System (eP-MABLS). Then, SPLKPM was created to include educational opportunities and credit hours. Thus, teachers can self-manage their training and independently acquire new skills and abilities online, from any location and at any time. Those who have not completed the seven-day training course may also take this initiative to comply with current regulations.

However, with any innovation, when power is transferred from planners to teachers, significant changes can be predicted at the implementation stage of such audacious top-down educational reform

innovations (Konting, 2016). Additionally, it is found that the virtual learning medium is less popular among teachers due to a lack of knowledge and skills to handle technology-based lessons (Ahmad Saifudin & Hamzah, 2021). Moreover, even if schools have technological equipment, teachers are ultimately responsible for curriculum implementation through educational technologies (Konting, 2016; Koyuncuoglu, 2021).

Thus, it raises the question of SRTs' acceptance of online CPD. How will SRTs in Malaysian primary schools perceive and respond to Online CPD? Which factors will facilitate and impede them from accepting Online CPD? These questions must be investigated because teachers must possess adequate pedagogical, technical, and content-based expertise and an understanding of the interactions between these three types of knowledge to effectively promote student-centred education (Koyuncuoglu, 2021; Schoepp, 2005).

2. Research Objectives

Numerous studies have established the value of ongoing training to improve teachers' performance which is critical for effectively transforming a lagging school. Studies show that effective CPD is CPD that is implemented continuously, contextually, school-based and educator-centred (Blau et al., 2011). Covid-19 pandemic outbreaks have also interrupted and altered the educational sector for most of 2020 (Dhawan, 2020). However, there is still a lack of studies that explores SRTs' acceptance of adopting online CPD. Therefore, to better understand SRTs' intention to adopt Online CPD, this research is designed to determine SRTs' behavioural intention to learn online and the conditions and factors affecting the teachers' behavioural intention to learn online, thus will provide empirical evidence to the existing knowledge. Accordingly, the following research questions will be addressed:

1. What is the extent of SRTs' acceptance of online CPD?
2. What are SRTs ' perceived ease of use; perceived usefulness; attitude; computer self-efficacy, and social factors towards SRTs' behavioural intention towards online CPD?
3. What are the relationships between SRTs' perceived ease of use, perceived usefulness; attitude; computer self-efficacy and social factors towards SRTs' behavioural intention to teach online?

3. Conceptual Framework

This research will use the Technological Acceptance Model (TAM) as its framework because it is a well-established and reliable method for predicting user acceptance (Venkatesh & Davis, 2000). It was proposed to forecast user acceptance and adoption of new computer applications (Davis, 1989). It has progressively been utilised to measure the intent to use specific innovations or services (Wang et al., 2015).

The model suggests that the system and behavioural intention (BI) can be explained by the following constructs: perceived usefulness (PU), perceived ease of use (PEU), and attitude towards using (ATU) to use the system. TAM has two primary components: perceived usefulness (PU) and perceived ease of use (EOU). PU refers to the extent to which a user perceives a product's or service's usefulness. Meanwhile, EOU is the extent to which the user believes using the tool will be effortless. Prior research also identified other external variables as additional predictors of intention to use a system. As a result, for this research, computer self-efficacy (CSE) and social factors (SF) have been chosen as the external factors to determine their correlation with BI. Figure 1 is the proposed conceptual framework for this study.

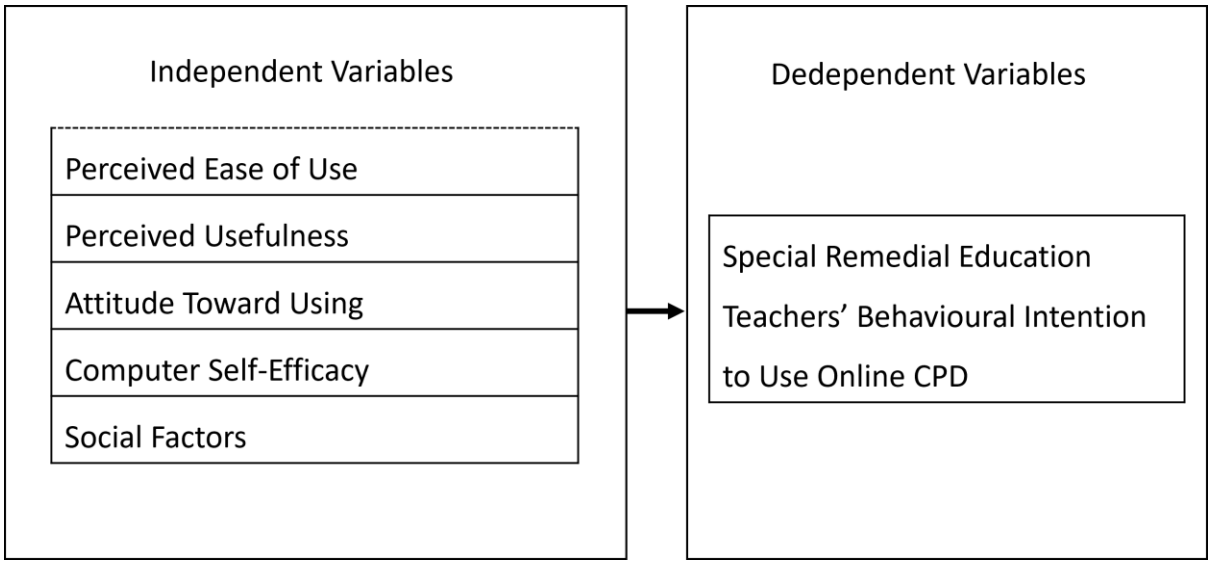

Figure1. Proposed Conceptual Framework

4. Research Methodology

4.1 Research Design

The researchers will begin by identifying the sample required for this study and subsequently develop the appropriate questionnaires for the survey. Causal comparison and correlational research designs will be used in this study. The causal comparison design is a research method that compares at least two groups that differ on a particular subject. The subject and case studied emerge naturally from this research design, unaffected by the researcher's intervention or manipulation. The researcher has no influence or intervention in this design's comparison groups.

4.2 Population and Sample Size

A population is a group of individuals who have the same characteristic. In inconvenience sampling, researchers have easy access chosen as the sample (Cohen et al., 2002). Hence, the research participants in this study will be recruited using convenience sampling, consisting of SRTs of the 542 primary schools in the state of Pahang. Krejcie & Morgan's (1970) table was used to select the sample size of this research. Thus, 215 respondents will be chosen as the sample for this study.

4.3 Sampling Technique

The researcher will use simple randomised sampling for this study, consisting of Remedial Education teachers of Pahang who teach in Sekolah Kebangsaan and Sekolah Jenis Kebangsaan. The researcher believes that the sample from this population can represent the population of Remedial Education teachers in Malaysia because Malaysian Education System is centralised. Thus, survey participants will be selected randomly from the target population of SRTs from Pahang to eliminate sampling errors and ensure appropriate population representation,

4.4 Data Collection and Analysis

This non-experimental quantitative study will employ the administration of a structured online questionnaire via Google Forms. The entire data collection process is expected to last six weeks. The research will develop the survey instrument based on the research questions guiding this investigation. After the instrument is completed, a pilot study will be conducted to eliminate ambiguity in the questions and test the instrument's

reliability and validity. If flaws are discovered during the pilot test, the instrument will be redesigned and revised until it is acceptable. The instruments were then administered to the target population; once completed, the surveys were collected for data analysis.

Exploratory data analysis is the primary step to analyse data using inferential statistics such as MANOVA, Pearson's Correlation (r) or Multiple Linear Regression Tests. It will be done to identify if there is data loss or outliers. It also can identify whether the assumptions for normality, linearity, homoscedasticity and independent observation are met. Descriptive and inferential statistical analyses will be performed to address the research questions.

Descriptive statistics provides an outline, summary or understanding of a specific dataset. Meanwhile, inferential statistics aims to transcend the immediate data and draw inferences about the population characteristics based on the samples. Therefore, Descriptive Analysis will be employed to analyse research questions 1 and 2. Pearson correlation will be used to analyse question 3 to examine the relationships between the predictors and dependent variables involved in the study.

5. Proposed Contribution

The study of the acceptance of technology is crucial to effectively adopting any informative system (Buche et al., 2012). Despite the recent flood of online courses for teachers within educational organisations, remedial education teachers' acceptance of Online CPD is not guaranteed. SRTs are tasked with educating those who need proper care and remediation. However, there is still a lack of studies on SRTs concerning technology adoption. By disclosing teachers' intentions and attitudes toward technology, educational administrators will have enough information to foster and improve teacher-learner acceptance of ICT tools for current and prospective users (Lee et al., 2001). This study will answer the research objectives by looking into the correlation between perceived ease of use, perceived usefulness, attitude, computer self-efficacy, and social factors towards SRTs' behavioural intention toward online CPD. Thus, this research seeks to add to the existing body of knowledge regarding remedial education teachers' Technological, Pedagogical and Content Knowledge and how it relates to the acceptance of Online CPD.

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