

Knowledge and Attitudes of Pre-Service Teachers in North Malaysia Related to Inclusive Education for Special Educational Need Students

Nazmin Abdullah, Mohd Hanafi Mohd Yasin & Hasnah Toran

The National University of Malaysia, Bangi, Selangor

Email: nazmin@ipgkda.edu.my

To Link this Article: <http://dx.doi.org/10.6007/IJARBS/v12-i8/14674> DOI:10.6007/IJARBS/v12-i8/14674

Published Date: 10 August 2022

Abstract

One of the most important elements in supporting inclusive education has been shown to be pre-service teacher preparation. 469 pre-service teachers from a teacher education institute in northern Malaysia, representing a variety of genders and courses, participated in this study. Their responses were based on their attitudes and knowledge regarding the inclusive education of special educational needs students (SENS). With a mean score of 6.74, the findings indicated that the respondents' knowledge about SENS inclusive education was at a moderate level. Meanwhile, pre-service teachers shows high level of attitude toward SENS inclusive education with mean score of 8.48. Regarding the gender inequalities in pre-service teachers' attitudes and understanding of SENS inclusive education in the north, it was discovered that men pre-service teachers had more knowledge than female pre-service teachers. The results of the Tukey HSD post hoc test revealed a significant difference in the mean knowledge between the special education course group, which had a mean score of 7.9967 compared to other course groups, which had a score of 7 and lower ($p = 0.000$). This indicates that compared to other pre-service course teachers, special education pre-service teachers have higher knowledge and attitudes as a result of their training.

Keywords: Inclusive Education, Special Education Need Students, Pre-Service Teacher, Knowledge.

Introduction

All individuals are different from each other and ensuring that they have equal opportunities in the education system remains a worldwide challenge (Saloviita, 2020). Inclusive education, which promotes respect for individual differences and equal opportunities for all, responds to the diverse needs of students by increasing their participation in education, culture and society as well as reducing discrimination in the education system (Florian, 2019). According to UNESCO (2015), inclusive education, is a dynamic approach to respond positively to student diversity rather than seeing individual differences as a problem, putting the right to

education in action by approaching all students, respecting their diverse needs, abilities and characteristics and eliminating all forms of discrimination in the learning environment.

The education of special educational need students (SENS) in mainstream classrooms became an internationally accepted goal along with the United Nations declaration in 1993 (UNESCO, 1994) and at the World Conference on Special Needs Education in Salamanca (UNESCO), 1994). The concept of inclusive education presented in the Salamanca Declaration contains the principle of equal access for all pupils in mainstream classrooms, and the demand for accommodation and support necessary to meet the diverse needs of all children (UNESCO, 1994). The Incheon Declaration for 'Education 2030: Towards equitable and inclusive quality education and lifelong learning for all' recently reaffirmed its commitment to making the necessary changes in worldwide policy (UNESCO, 2015). This indeed requires inclusive values demonstrated by all stakeholders. The process is indeed demanding, requiring a change of way of thinking (Ainscow, 2020), the role of organizational culture and leadership (Azorin & Ainscow, 2020; Kinsella, 2020); requires inclusive values in policy formulation (Ainscow, 2020); implement practices at all levels (Ryan, 2020); and embrace the pedagogical core of variables to enhance the learning capacity of SENS and all students (Hart & Drummond, 2014).

Malaysia demonstrates its commitment to quality and inclusive education through the 'Malaysia Education Blueprint 2013-2025' (Ministry of Education Malaysia, 2013b). The Ministry of Education Malaysia targets that "75% of SENS enroll in inclusive programs by 2025" (Ministry of Education Malaysia, 2013b pp. 4-17). The journey to improve this education system began in the early stages of post-colonialism. Malaysia's education system, policies, laws and various contexts as a multi-ethnic, multi-cultural and multi-lingual nation, however, lead to challenges that need to be faced. In addition, the success of the promotion of inclusive education also requires the important role of teachers as implementers.

Research on attitudes and knowledge about inclusive education has shown a controversial issue as these factors among mainstream teachers is increasingly becoming a focus around the world. There is a study by You, Kim & Shin (2019) that aimed to measure the mediating effect of teachers' beliefs on inclusive education on the relationship between demographic variables and teacher context and their self-efficacy through structural equation modeling (SEM). The results of the study suggest that although pre-service teacher training experience and age have no clear relationship with teachers' attitudes in inclusive education, teaching and training experience has a significant indirect relationship with their self-efficacy through their belief in inclusive education. Researchers emphasize that teachers' attitudes towards inclusive education include from the aspects of social and cognitive development of SENS and typical students' knowledge of the needs of SENS. Therefore, this study investigates the knowledge and attitudes of pre-service teachers about SENS inclusive education

Research Objective

A survey related to the knowledge and attitudes of pre-service teachers in the north on SENS inclusive education.

Research Questions

1. What is the level of knowledge of pre-service teachers in the north related to SENS policies, characteristics, teaching techniques, support and attitudes towards SENS inclusive education?

2. What are the differences in the knowledge and attitudes of pre-service teachers in the north regarding SENS inclusive education according to gender?
3. What are the differences in the knowledge and attitudes of pre-service teachers in the north related to SENS inclusive education according to courses?

Methodology

Respondents

Ethical approval has been obtained by the Department of Special Education; Teacher Education Institute Northern Campus. Before deciding to take part in the study, notice of consent was sought. Pre-service teachers are free to participate and are told that refusal to participate in no way will affect their educational status at the training institution. A total of 469 second-year pre-service teachers in the north completed the survey for analysis; this represents a 100% response rate.

Instruments

All items of the questionnaire were adapted to the context of Malaysian culture from the measures used in previous studies that surveyed the knowledge and attitudes of pre-service teachers towards SENS inclusive education. Questionnaires using item content from previous studies (Kogan et al., 2009) were created for this purpose, and these past studies generally used pilot studies to ensure adequate item clarity and psychometric properties. The questionnaire assessed 1) the level of knowledge of pre-service teachers in the north related to policies, characteristics of SENS, teaching techniques, support and attitudes towards SENS inclusive education, 2) differences in knowledge and attitudes of pre-service teachers in the north regarding SENS inclusive education by gender, and 3) differences in the level of knowledge and attitudes between course groups of pre-service teachers in the north related to SENS inclusive education.

This study uses a survey study design and a quantitative approach. The questionnaire for this research was adapted from research by Zulkifli et al (2019) related pre-service teachers' knowledge of classroom management. The questionnaire was revised to make it compatible to answer the study questions. Two experts in special education with a Doctor of Philosophy Degree and over twenty years of experience were appointed to examine the validity of the content of the instrument. Suggestions for improvement by experts have been considered. Two SENS were appointed to investigate the face validity of the instrument. Based on the feedback, the clarity and understanding of the items in the instrument is very good. Cronbach Alpha ranged from 0.92 to 0.96 for all sub-scales.

Assessment Steps

Questionnaires were distributed to respondents and re-collected after two weeks. Feedback from respondents was recorded in the Statistical Package for the Social Sciences and analyzed using descriptive and inferential statistics.

Demographics of Study Respondents

Study participants completed a questionnaire that identified their demographic information such as gender and group of teacher training areas being studied. A total of 469 pre-service teachers from an Institute of Teacher Education in northern Malaysia participated in this research. Purposive sampling technique is used in sample selection. Study participants who

participated in this research were among second year pre-service teachers in various field groups including special education. These criteria are given to ensure that the respondents have completed the Inclusive Education course and teaching practicum for degree level studies.

Descriptive analysis of the demographic information of the course group showed, 23.30% of the respondents were History course, 21.50% from Malay Language, 20.30% from Islamic Studies, 13.40% from Counseling, 11.30% from TESL and 10.20% from Special Education. Next, 36.9% of the respondents were male and 63.1% were female. The composition of the pre-service teacher course group is as follows Figure 1.

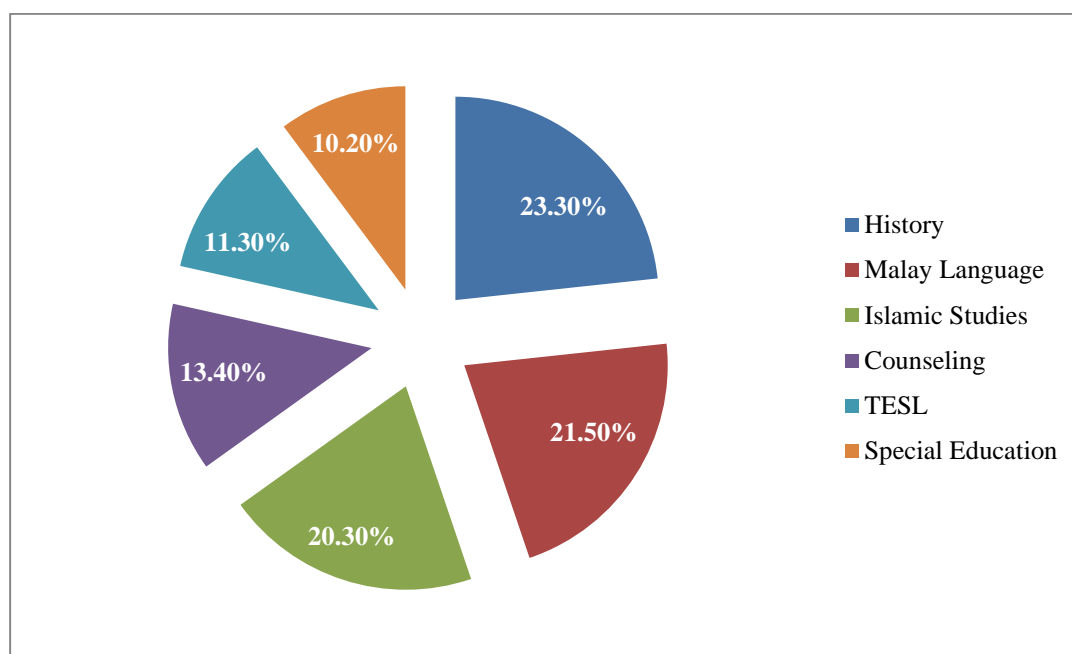


Figure 1: Composition of research respondents by course

Findings and Discussion

Findings

The level of knowledge of pre-service teachers in the north related to SENS policies, characteristics, teaching techniques, support and attitudes towards SENS inclusive education. Descriptive analysis of the data in Table 1 shows that pre-service teachers in the north have a moderate level of knowledge about policies, inclusive education and technology for SENS with mean values of 5.83, 6.53, 6.63. Knowledge of SENS characteristics recorded a high level with a mean value of 8.04. The overall knowledge of pre-service teachers was at a moderate level with a mean value of 6.74. Meanwhile, the attitude of pre-service teachers towards inclusive education showed a high level with a mean value of 8.48. These findings are similar to the study conducted by Zulkifli et al. in 2019 which reported that pre-service teachers in the field of special education in Malaysia have good knowledge and attitude towards special education.

Table 1

Level of knowledge and attitudes of pre-service teachers in the north

Knowledge	Mean	Standard Deviation	Level
Policy	5.83	2.14	Moderate
SENS Characteristics	8.04	1.77	High
Inclusive Education	6.53	2.18	Moderate
Technology	6.63	2.03	Moderate
Overall	6.74	1.84	Moderate
Attitude	8.48	1.53	High

Differences in the knowledge and attitudes of pre-service teachers in the north regarding SENS inclusive education according to gender.

H_0 : There was no significant difference in the knowledge of pre-service teachers in the north related to SENS inclusive education between genders.

There were significant differences in knowledge between pre-service teachers in the north related to SENS inclusive education according to gender male ($M = 7.05$, $SD = 1.78$) and female ($M = 6.57$, $SD = 1.86$); $t(469) = 2.745$, $p = 0.006$. Male pre-service teachers were found to have a higher mean of knowledge than female pre-service teachers. Pre-service teachers' knowledge of inclusive education is associated with various demographic factors including gender factors (Tuncay & Kizilaslan 2022). Male study participants had higher knowledge of inclusive education than females. However, several studies have found that gender does not significantly affect knowledge of inclusive education and practices or perceptions of SENS participating in inclusive education (Tuncay & Kizilaslan, 2022; Pasha et al., 2021). This statement is also supported by (Apoku et al., 2022; Wray & Subban, 2022).

H_0 : There was no significant difference in the attitudes of pre-service teachers in the north towards SENS inclusive education between the genders.

There were no significant differences in the attitudes of pre-service teachers in the north related to SENS according to male ($M = 8.35$, $SD = 1.44$) and female ($M = 8.55$, $SD = 1.58$); $t(467) = 1.38$, $p = 0.168$.

Differences in the knowledge and attitudes of pre-service teachers in the north related to SENS inclusive education by course

H_0 : There was no significant difference in knowledge related to SENS inclusive education between the pre-service teacher course groups in the north.

Based on the one-way ANOVA test performed, there was a significant difference in the level of knowledge of pre-service teachers in the north related to SENS by group ($F(5, 468) = 6.309$, $p = 0.000$). Therefore, post hoc tests were conducted to identify the course groups of pre-service teachers who showed differences. The findings of the Tukey HSD post hoc test showed that there was a significant difference in mean knowledge between the special education pre-service teacher course group with other course groups ($p = 0.000$). The mean knowledge differences between the pre-service teacher course groups are shown in Table 2.

Table 2

Mean differences of pre-service teachers' knowledge by course group

Knowledge	Mean	Standard Deviation	Level
History	6.7161	1.70358	Moderate
Malay Language	6.8575	1.78092	Moderate
Islamic Studies	6.4008	1.78169	Moderate
Counseling	6.5484	1.99579	Moderate
TESL	6.2917	2.15574	Moderate
Special Education	7.9967	1.21444	High

Direct experience with SENS cannot be assumed, universally, to foster knowledge of inclusive education (Longley & Craigo, 2021; Goddard & Evans, 2018). However, greater exposure in the special education course group was a predictor to higher Special Education pre-service teachers' knowledge of inclusive education in this study. Many previous researchers have focused on the strong influence of exposure in the field of inclusive education on teachers' knowledge and attitudes toward SENS inclusive education (Boyle et al., 2022; Makoelle & Burmistrova, 2021).

H_0 : There were no significant differences in attitudes regarding SENS inclusive education between the pre-service teacher course groups in the north.

Based on the one-way ANOVA test performed, there was no significant difference in the level of attitude of pre-service teachers in the north related to SENS by group ($F(5, 468) = 1.829, p = 0.126$).

Discussion

Four hundred and sixty-nine pre-service teachers from six different course groups at northern Malaysian teacher training institutes were asked about their knowledge and attitudes towards inclusive education. The results show that the study respondents' knowledge of SENS inclusive education is at a moderate level, while the mean for the attitude of pre-service teachers towards SENS inclusive education is at a high level. The experience of meeting with SENS during practical training did not increase knowledge about inclusive education. However, the level of knowledge and attitude of the respondents was higher for pre-service teachers who took special education course. These results are in line with previous findings on the positive effects of formal training and direct experience with inclusive SENS on the knowledge and attitudes of pre-service teachers (Sharma et al., 2021).

Findings from this research indicate that preservice teachers show moderately low readiness to teach inclusive classrooms. This suggests that the willingness to teach inclusive classrooms among preservice teachers is quite negative. The results obtained are supported by previous study conducted by Loreman et al (2013) showing pre-service teachers are not prepared to teach in an inclusive environment. The results of this study revealed several aspects of pre-service teacher training related to inclusive education that need to be improved, especially to the group of pre-service teachers in the fields of History, Malay Language, Islamic Studies, Counseling and TESL. Overall, the study respondents were at a moderate level in the aspects of knowledge on inclusive education related to policy, characteristics of SENS, inclusive education, technology and overall.

Conclusion

This research investigates the knowledge and attitudes about inclusive education regarding: 1) the level of knowledge of pre-service teachers in the north related to policies, characteristics of SENS, teaching techniques, support and attitudes towards inclusive education SENS, 2) differences in knowledge and attitudes of pre-service teachers in the north related to SENS inclusive education by gender, and 3) differences in the level of knowledge and attitudes between groups of pre-service teachers in the north related to SENS inclusive education. The findings of the study showed that pre-service teachers from 6 groups of courses at the Institute of Teacher Education in northern Malaysia showed a moderate level of knowledge of inclusive education and a high level of mean value for attitude. It can be concluded that the Institute of Teacher Education in northern Malaysia provides moderately sufficient input on inclusive education in the pre-service teacher training program of non-special education groups. However, further study of the knowledge and practice of pre-service teachers in the classroom is needed. This is because effective teachers are able to make connections between theory and practice in the classroom.

Acknowledgement

The responsibilities of the author are as follows - Nazmin Abdullah: designing research and writing manuscripts; Assoc. Prof. Mohd Hanafi Mohd Yasin: analyzing data and edited manuscripts; Assoc. Prof. Hasnah Toran: reviewing the final contents of the manuscript; and all authors: read and approve the final manuscript. No author has a conflict of interest. We thank Aze Fauziah Shuib for her assistance in data acquisition and cleaning.

Corresponding Author

Nazmin Abdullah

Postgraduate Student (Phd) Faculty of Education Malaysia, The National University of Malaysia, Bangi, Selangor, Malaysia

Email: nazmin@ipgkda.edu.my

Reference

- Ainscow, M. (2020). Promoting inclusion and equity in education: lessons from international experiences. *Nordic Journal of Studies in Educational Policy*, 6(1), 7-16.
- Azorín, C., & Ainscow, M. (2020). Guiding schools on their journey towards inclusion. *International Journal of Inclusive Education*, 24(1), 58-76.
- Boyle, C., Allen, K. A., Barrell, C., & Pahlevansharif, S. (2022). Primary and Secondary Pre-Service Teachers' Attitudes towards Inclusive Education.
- Florian, L. (2019). On the necessary co-existence of special and inclusive education. *International Journal of Inclusive Education*, 23(7-8), 691-704.
- Goddard, C., & Evans, D. (2018). Primary pre-service teachers' attitudes towards inclusion across the training years. *Australian Journal of Teacher Education*, 43(6), 122-142.
- Hart, S., Drummond, M. J., & McIntyre, D. (2013). Learning without limits: Constructing a pedagogy free from determinist beliefs about ability. *The Sage handbook of special education*.
- Kinsella, W. (2020). Organising inclusive schools. *International Journal of Inclusive Education*, 24(12), 1340-1356.

- Kogan, M. D., Blumberg, S. J., Schieve, L. A., Boyle, C. A., Perrin, J. M., Ghandour, R. M., & van Dyck, P. C. (2009). Prevalence of parent-reported diagnosis of autism spectrum disorder among children in the US, 2007. *Pediatrics*, 124(5), 1395-1403.
- Longley, J. M., & Craigo, L. (2021). Exploration of Preservice Teacher Attitudes Towards Disability. *Community College Journal of Research and Practice*, 1-16.
- Makoelle, T. M., & Burmistrova, V. (2021). Teacher education and inclusive education in Kazakhstan. *International Journal of Inclusive Education*, 1-17.
- Ministry of Education Malaysia. (2013). Malaysia Education Blueprint 2013-2025. Putrajaya: Ministry of Education Malaysia.
- Opoku, M., Cuskelly, M., Rayner, C., & Pedersen, S. (2022). The impact of teacher attributes on intentions to practice inclusive education in secondary schools in Ghana. *International Journal of Disability, Development and Education*, 69(2), 382-398.
- Pasha, S., Yousaf, F., & Ijaz, M. (2021). Preparedness of Prospective Teachers for Inclusive Education: Pre-Service Teachers' Knowledge and Skills. *Review of Education, Administration & Law*, 4(2), 355-363.
- Ryan, C. (2020). Students learning as researchers of curriculum in an undergraduate programme. *Innovations in education and teaching international*, 57(6), 644-654.
- Saloviita, T. (2020). Attitudes of teachers towards inclusive education in Finland. *Scandinavian Journal of Educational Research*, 64(2), 270-282.
- Sharma, U., Sokal, L., Wang, M., & Loreman, T. (2021). Measuring the use of inclusive practices among pre-service educators: A multi-national study. *Teaching and Teacher Education*, 107, 103506.
- Tuncay, A. A., & Kizilaslan, A. (2022). Pre-service teachers' sentiments, attitudes and concerns about inclusive education in Turkey. *European Journal of Special Needs Education*, 37(2), 309-322.
- UNESCO, World Education Forum, Ministry of Education, Republic of Korea. (2015). *Education 2030 Incheon Declaration and Framework for Action: Towards inclusive and equitable quality education and lifelong learning for all*. Incheon: World Education Forum. <https://en.unesco.org/world-education-forum-2015/incheon-declaration>.
- UNESCO. (1994). *The Salamanca Statement and Framework for Action on Special Needs Education*. UNESCO.
- Wray, E., Sharma, U., & Subban, P. (2022). Factors influencing teacher self-efficacy for inclusive education: A systematic literature review. *Teaching and Teacher Education*, 117, 103800.
- You, S., Kim, E. K., & Shin, K. (2019). Teachers' belief and efficacy toward inclusive education in early childhood settings in Korea. *Sustainability*, 11(5), 1489.
- Zulkifli, A. S., Sulaiman, N. F., & Mohamed, S. (2019). Pre-service teachers knowledge of classroom management. *Creative Education*, 10(12), 2548.