

# TEACHER EXPERIENCE WITH AUTISTIC STUDENTS AND THE RELATIONSHIP WITH TEACHER SELF-EFFICACY: OUTCOMES FOR INCLUSIVE EDUCATION

---

TROY Q. BOUCHER

*Simon Fraser University*

## Abstract

*Autism spectrum disorder (ASD) is a developmental disorder characterized by challenges in social communicative skills and repetitive and restricted behaviours and activities. In recent years there has been an increased integration of autistic students into mainstream classrooms in Canada alongside policy necessitating inclusive teaching practices. Teachers of these inclusive classrooms, however, report being underprepared to address the learning and behavioural needs of autistic students. Many teachers have stated that they are unable to provide effective instruction that benefits all students due to a lack of practical experience teaching autistic students in their teaching program. A teacher's lack of experience results in an inability to facilitate an effective inclusive classroom environment, which in turn has negative consequences on their self-efficacy and future implementation of inclusive teaching strategies. Low teacher self-efficacy may undermine a teacher's propensity to provide an inclusive environment, which is further reinforced when they are unable to accommodate autistic students. Recommendations for pre-service and in-service teachers are discussed in consideration of the reciprocal relationship between teacher self-efficacy and the academic outcomes for autistic students.*

*Keywords:* autism spectrum disorder, teacher self-efficacy, inclusive education, teaching programs, autistic students, Canada

### **Teacher Inexperience with Autistic Students and the Relationship with Teacher Self-Efficacy: Outcomes for Inclusive Education**

Autism spectrum disorder (ASD) is a developmental disorder involving challenges in social communicative ability and verbal and non-verbal communication. ASD is also characterized by restricted and repetitive patterns of behaviours that may be disruptive in daily activities such as a strict adherence to routines and stereotyped or repetitive motor movements (APA, 2013). Currently, 1 in 45 children are diagnosed with ASD the United States (Zablotsky, Black, Maenner, Schieve, & Blumberg, 2015), an increase from 1 in 80 in 2011 attributed to improved diagnostic criteria and expanded conditions that fall under the autism spectrum (APA, 2013). With this increased rate of diagnosis, there has also been an increased inclusion of autistic children<sup>1</sup> in mainstream public classrooms (Moores-Abdool, 2010; Lindsay, Proulx, Thomson, & Scott, 2013a). With greater inclusion of autistic students in mainstream classes, teachers have voiced concerns that they are underprepared to successfully deal with the learning and behavioural challenges that may arise in teaching autistic students (Lindsay et al., 2013a).

The lack of training and experience teachers have with autistic students likely impacts the instructor's teacher self-efficacy, specifically the judgement of their ability to implement effective teaching strategies which address the diverse needs of their students (Bruning, Schraw, & Norby, 2011; Syriopoulou-Delli, Cassimos, Tripsianis, & Polychronopoulou., 2012). If a teacher is unprepared to teach autistic students and fails to meet their learning needs, this failure will have a reciprocal influence on teacher self-efficacy; low teacher self-efficacy, such as perceiving oneself as unable to address the learning needs of all students, will reduce the likelihood of engaging in inclusive educational practices due to beliefs of incompetence, and will result in poor academic and behavioural outcomes for the student. This pertinent issue of the lack of experience teachers have with autistic students must be addressed in order to improve teacher self-efficacy and children's learning. A poor understanding of ASD and an inability to facilitate an inclusive classroom that benefits both autistic and non-autistic students is detrimental to the learning of children and the teacher's perceived ability to teach autistic students. Improvements to both teacher self-efficacy and to autistic students' learning can be achieved by providing practical experience for pre-service teachers to work with autistic students and useful supports and strategies for teachers to use in inclusive education settings.

#### **Inclusive Education and Teacher Inexperience**

In the Canadian public school system, there has been an increase in policy promoting inclusive education and an increase in autistic students in mainstream classrooms (McCrimmon, 2015; Moores-Abdool, 2010). The call for increased inclusivity arose from the claims that separate educational settings for children with diverse needs is discriminatory, as these students were not afforded the same academic, social, and behavioural opportunities as other students (McCrimmon, 2015; Porter, 2008). As a result of these claims, all Canadian provinces and territories have formally adopted the practice of inclusive education with the vision of promoting

equal opportunities for growth, dignity, and participation of all students (Inclusive Education Canada, 2017).

Several challenges arose with the decision to increase inclusive education, foremost the lack of training and experience teachers have in applying the best practices for effective inclusion of students with developmental disabilities such as ASD (Lindsay et al., 2013a). Pre-service teachers have reported a lack of confidence in their abilities to manage an inclusive classroom, questioning their capacity to meet the needs of their students (Busby, Ingram, Bowron, Oliver, & Lyons, 2012). While pre-service teachers may receive training on various strategies to use with autistic students in the classroom, teachers often do not receive opportunities to apply these strategies in inclusive classrooms. If teachers are able to practice these strategies, it likely occurs in contrived or irrelevant contexts (i.e., research settings or one-on-one with students), which are not reflective of the actual classroom environment (Crosland & Dunlap, 2012, Lindsay, Proulx, Scott, & Thomson, 2013b; Sharma, Forlin, & Loreman, 2008). New teachers have remarked that while their education has helped instill positive attitudes towards autistic students (Park & Chitiyo, 2011), little practical experience is provided regarding the effective handling of the child's externalizing behaviours (Busby et al., 2012), implementing self-management strategies with the student such as goal setting (Crosland & Dunlap, 2012), and how to acquire funding for resources required for effective knowledge transfer (Lindsay et al., 2013a).

### **Teacher Inexperience and Teacher Self-Efficacy**

The failure to appropriately meet the learning needs of all students in inclusive educational settings will have a negative impact on the child's learning and the teacher's own self-efficacy (Bandura, 1994; Bruning et al., 2011). Several studies indicate that teachers report deficient experience in the development and implementation of lesson plans and curricula specifically tailored autistic students, particularly if these students are unmotivated to engage with the content (Horne & Timmons, 2009; Lindsay et al., 2013a). These educators state that they cannot teach class content in a meaningful way that facilitates learning for everyone, reporting an inability to meet the educational needs of every student. The self-efficacy of teachers decreases as they are unable to produce desired academic outcomes for autistic students, and these continued failures will instill doubt in an instructor's teaching abilities (Bray-Clark & Bates, 2003). This self-doubt in teaching ability is further related to reduced adaptive teaching strategies implemented by teachers, engagement with students with diverse needs, and decreased individualization of instruction for students exhibiting behavioural and learning difficulties (Bruning et al., 2011; Sharma & Sokal, 2016).

A factor in the relationship between teacher self-efficacy and inexperience teaching autistic students is the reduced capacity to manage an inclusive classroom. Busby and colleagues (2012) report that teachers with little to no experience with autistic students feel less able to meet the learning needs of their students and effectively manage students' challenging behaviours such as acting out and inattention. In a set of interviews with elementary school principals in

Alberta and Finland, Jahnukainen (2015) identified that most principals stated that their teachers' abilities for inclusive education are insufficient for children with developmental disorders and behavioural challenges. The incapacity of teachers is highlighted by two Albertan principals in the study who state that children were transferred to other schools when teachers were unable to manage the students' behavioural problems in their classroom. Capacity must be built with teachers and educators such that they possess the skills and experience to effectively manage and contribute to the learning of autistic children in inclusive classrooms.

### **Recommendations for Pre- and In-Service Teachers**

Inclusive education requires more than the placement of diverse students into a general classroom (Lynch & Irvine, 2009). Current pedagogical research recommends the implementation of standard practices for instruction in inclusive classrooms, predominately strength-based approaches that adapt curricula to the learning, sensory, and cognitive needs of students (Denning & Moody, 2013; Lynch & Irvine, 2009). Crosland and Dunlap (2012) suggest that a standard practice for teachers of inclusive classes includes implementing individualized teaching strategies and general organizational practices in instruction, such as individualized rubrics with specific learning outcomes for assignments and access to various methods of instruction. The specific methods that an instructor uses to successfully implement inclusive education strategies will vary with the individual needs of their students, as the strengths and challenges associated with ASD are heterogeneous across children (Denning & Moody, 2012).

While the suggested practices have been found to be efficacious in improving the learning of autistic students in inclusive classrooms, they are not efficaciously implemented by teachers without prior practical experience. In a study of in-service teachers in Manitoba, Sokal and Sharma (2017) identified that teachers with coursework related to inclusion and practical experience in inclusive educational settings had higher reported efficacy for inclusive instruction. The authors conclude that neither experience nor coursework alone is sufficient to predict teaching efficacy in inclusive settings. By providing pre-service teachers with various strategies to meet the educational needs of their students in inclusive classrooms and the coinciding practical experience to implement these strategies, it is expected that the prominent self-doubt and poor perceived self-efficacy would be mitigated. A practicum in an inclusive classroom would benefit teacher self-efficacy as teachers undergo mastery experiences that reflect their ability to successfully implement various teaching strategies (Bandura, 1994; Bruning et al., 2010). A history of successfully using inclusive teaching strategies would develop competence and self-efficacy in the instructional abilities of pre-service teachers, so when they begin teaching in an inclusive classroom, they will possess the skills and capacity to facilitate optimal instruction (Bandura, 1994; Bruning et al., 2010).

Many teachers with minimal experience in inclusive classrooms have reported that they are concerned that they have neither the time to prepare nor to implement individual lessons or curricula for autistic students and non-autistic students (Horne & Timmons, 2009; Lindsey et al., 2009a; McGhie-Richmond, Irvine, Loreman, Cizman, & Lupart, 2013). These beliefs are further

related to poorer attitudes towards inclusive practices, such as not feeling as if they are responsible for developing individualized learning materials for autistic students (Barned et al., 2011). Conversely, both pre-service and in-service teachers with experience in inclusive classrooms report fewer concerns in their ability to develop and implement specialized lesson plans and educational material for autistic students (Jordan, Schwartz, & McGhie-Richmond, 2009) and felt a greater responsibility to ensure that the learning needs of all students are met (Friesen & Cuning, 2018). Continual success implementing inclusive teaching strategies with autistic students both as a pre-service and in-service teacher could then increase the likelihood of teachers implementing more inclusive teaching strategies.

Effective teaching strategies and skills for the inclusive education of autistic students benefit both students with and without autism in the classroom as teachers develop greater self-efficacy. Inclusive teaching requires high levels of commitment to planning and preparation (Jordan et al., 2009) and continual education and coursework (Sokal & Sharma, 2017). Commitment to students' learning and ongoing education are two practices that are related to higher teacher self-efficacy (Specht et al., 2015). The enactive mastery experiences that a teacher accumulates in successfully implementing inclusive educational practices strengthen their belief that they can enact positive change and influence the learning of students. Greater teacher self-efficacy would promote future implementation of effective teaching strategies with students and increase the resilience teachers have in overcoming obstacles to instruction such as challenging behaviours and amotivation (Bandura, 1994; Bray-Clark & Bates, 2003). All students benefit from the teacher's perseverance through challenges that arise during instruction, and once again, teacher self-efficacy would benefit from these experiences.

### **Conclusion**

Simon Fraser University states that the goals of their professional development program are to develop teachers who possess a commitment to lifelong learning, the skills to implement effective educational practices, and the ability to create opportunities for learning by all students (Simon Fraser University, 2016.). Like Simon Fraser University, effective teaching programs in Canada intend to develop committed and highly-efficacious teachers through the instruction and development of knowledge and practical skills (Jordan et al., 2009; McCrimmon, 2015; Porter, 2008; Specht et al., 2015). However, despite the goals of these programs, Canadian teachers report feeling underprepared to manage an inclusive classroom (McCrimmon, 2015).

Research with Canadian educators has continuously espoused the need for effective teacher training to develop greater self-efficacy and strategies for inclusive instruction (Jahnukainen, 2015; Sharma et al., 2006; Specht et al., 2015). Pre-service teachers remark that they would feel more confident if they are provided with practical experience in their teaching program (Lindsay et al., 2013b; McGhie-Richmond et al., 2013) while in-service teachers requested ongoing professional development and training to master inclusive teaching strategies (Horne & Timmons, 2009; Lindsay et al., 2013a; Sokal & Sharma, 2017). These findings indicate that most teachers have the desire to develop competence and possess the capacity to

provide effective instruction to all students in inclusive classrooms (Bray-Clark & Bates, 2003; Busby et al., 2012). More can be done to prepare teachers for the challenges they will face in instructing diverse students in the inclusive classrooms, which in turn will produce positive learning outcomes for all children and increased self-efficacy in teachers.

## References

- American Psychiatric Association. (2013). *Diagnostic and statistical manual of mental disorders* (5th ed.). Arlington, VA: American Psychiatric Publishing.
- Bandura, A. (1994). Self-efficacy. In V. S. Ramachandran (Ed.), *Encyclopedia of human behavior* (Vol. 4, pp. 71-81). New York: Academic Press.
- Barned, N. E., Knapp, N. F., & Neuharth-Pritchett, S. (2011). Knowledge and attitudes of early childhood preservice teachers regarding the inclusion of children with autism spectrum disorder. *Journal of Early Childhood Teacher Education, 32*(4), 302-321.  
<https://doi.org/10.1080/10901027.2011.622235>
- Bray-Clark, N., & Bates, R. (2003). Self-efficacy beliefs and teacher effectiveness: Implications for professional development. *The Professional Educator, 26*(1), 13-22.
- Bruning, R., Schraw, G., & Norby, M. (2011). *Cognitive psychology and instruction* (5<sup>th</sup> ed.). Boston, MA: Pearson.
- Busby, R., Ingram, R., Bowron, R., Oliver, J., & Lyons, B. (2012). Teaching elementary children with autism: Addressing teacher challenges and preparation needs. *Rural Educator, 33*(2), 27-35.
- Crosland, K., & Dunlap, G. (2012). Effective strategies for the inclusion of children with autism in general education classrooms. *Behaviour Modification, 36*(3), 251-269.  
<https://doi.org/10.1177/0145445512442682>
- Denning, C. B., & Moody, A. E. (2013). Supporting students with autism spectrum disorders in inclusive settings: Rethinking instruction and design. *Electronic Journal for Inclusive Education, 3*(1), 1-22.
- Friesen, D. C., & Cunning, D. (2018). Making explicit pre-service teachers' implicit beliefs about inclusive education. *International Journal of Inclusive Education*. Advanced online publication. <https://doi.org/10.1080/13603116.2018.1543730>
- Horne, P. E., & Timmons, V. (2009). Making it work: Teachers' perspectives on inclusion. *International Journal of Inclusive Education, 13*(3), 273-286.  
<https://doi.org/10.1080/13603110701433964>
- Inclusive Education Canada (2017). *About*. Retrieved from <http://inclusiveeducation.ca/about/>
- Jahnukainen, M. (2015). Inclusion, integration, or what? A comparative study of the school principal's perceptions of inclusive and special education in Finland and in Alberta, Canada. *Disability & Society, 30*(1), 59-72.  
<https://doi.org/10.1080/09687599.2014.982788>
- Jordan, A., Schwartz, E., McGhie-Richmond, D. (2009). Preparing teachers for inclusive classrooms. *Teacher and Teacher Education, 25*, 535-542.  
<http://dx.doi.org/10.1016/j.tate.2009.02.010>
- Kenny, L., Hattersley, C., Molins, B., Buckley, C., Povey, C., & Pellicano, E. (2015). Which terms should be used to describe autism? Perspectives from the UK autism community. *Autism, 20*(4), 442-462. <https://doi.org/10.1177/1362361315588200>

- Lindsay, S., Proulx, M., Thomson, N., & Scott, H. (2013a). Educators' challenges of including children with autism spectrum disorder in mainstream classrooms. *International Journal of Disability, Development and Education*, 60(4), 347-362.  
<https://doi.org/10.1080/1034912X.2013.846470>
- Lindsay, S., Proulx, M., Scott, H., & Thomson, N. (2013b). Exploring teachers' strategies for including children with autism spectrum disorder in mainstream classrooms. *International Journal of Inclusive Education*, 18(2), 101-122.  
<https://doi.org/10.1080/13603116.2012.758320>
- Lynch, S. L., & Irvine, A. N. (2009). Inclusive education and best practice for children with autism spectrum disorder: An integrated approach. *International Journal of Inclusive Education*, 13(8), 845-859. <https://doi.org/10.1080/13603110802475518>
- McCrimmon, A. W. (2015). Inclusive education in Canada: Issues in teacher preparation. *Intervention in School and Clinic*, 50(4), 234-237.  
<https://doi.org/10.1177/1053451214546402>
- McGhie-Richmond, D., Irvine, A., Loreman, T., Cizman, J. L., & Lupart, J. (2013). Teacher perspectives on inclusive education in rural Alberta, Canada. *Canadian Journal of Education*, 36(1), 195-239.
- Moore-Abdool, W. (2010). Included students with autism and access to general curriculum. *Issues in Teacher Education*, 19(2), 153-169.
- Park, M., & Chitiyo, M. (2011). An examination of teacher attitudes towards children with autism. *Journal of Research in Special Education Needs*, 11(1), 70-78.  
<https://doi.org/10.1111/j.1471-3802.2010.01181.x>
- Porter, G. L. (2008). Making Canadian schools inclusive: A call to action. *Canadian Education Association*, 48(2), 62-66.
- Sharma, U., Forlin, C., & Loreman, T. (2008). Impact of training on pre-service teachers' attitudes and concerns about inclusive education and sentiments about persons with disabilities. *Disability & Society*, 23(7), 773-785.  
<http://dx.doi.org/10.1080/09687590802469271>
- Sharma, U., Forlin, C., Loreman, T., & Earle, C. (2006). Pre-service teachers' attitudes, concerns, and sentiments about inclusive education: An international comparison of novice pre-service teachers. *International Journal of Special Education*, 21(2), 80-93.
- Sharma, U., & Sokal, L. (2016). Can teachers' self-reported efficacy, concerns, and attitudes toward inclusion scores predict their actual inclusive classroom practices? *Australasian Journal of Special Education*, 40(1), 21-38. <http://dx.doi.org/10.1017/jse.2015.14>
- Simon Fraser University (2016). *Professional Development Program - 10 Program Goals*. Retrieved from <https://www.sfu.ca/education/teachersed/programs/pdp/goals/10-goals.html>
- Sokal, L., & Sharma, U. (2017). "Do I really need a course to learn to teach students with disabilities? I've been doing it for years". *Canadian Journal of Education*, 40(4), 739-760.



- Specht, J., McGhie-Richmond, D., Loreman, T., Mirenda, P., Bennet, S., Gallagher, T., Cloutier, S. (2015). Teaching in inclusive classrooms: Efficacy and beliefs of Canadian preservice teachers. *International Journal of Inclusive Education*, 20(1), 1-15.  
<https://doi.org/10.1080/13603116.2015.1059501>
- Syriopoulou-Delli, C. K., Cassimos, D. C., Tripsianis, G. I., & Polychronopoulou, S. A. (2012). Teachers' perceptions regarding the management of children with autism spectrum disorders. *Journal of Autism and Developmental Disorders*, 42(5), 755-768.  
<https://doi.org/10.1007/s10803-011-1309-7>
- Zablotsky, B., Black, L. I., Maenner, M. J., Schieve, L. A., & Blumberg, S. J. (2015). Estimated prevalence of autism and other developmental disabilities following questionnaire changes in the 2014 National Health Interview Survey. *National Health Statistics Reports*, 87, 1-20.