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Inclusive settings in Belizean primary schools: A focus on teacher practices

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Abstract
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Keywords
inclusive special education, special educational needs and disabilities (SEND), community-engaged research, teaching practices, primary education

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Inclusive Settings in Belizean Primary Schools: A Focus on Teacher Practices

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Abstract

Educators in Belize are charged with ensuring that all Belizeans are given an opportunity to acquire a quality education that promotes personal development and productive citizenship. Consequently, Belizean law now requires all children from ages five through fourteen to attend at least eight years of primary school. Students with special needs have historically not received accommodations in the education system, so many teachers struggle with meeting the needs of students with learning disabilities in these inclusive settings. This qualitative case study explored teaching strategies and contextual factors in inclusive primary classrooms in Belize and was conducted in the form of Community Engaged Research in partnership with the Ministry of Education, Youth, Sports, and Culture (MOE). Findings suggest consistent approaches for differentiating instruction, teacher passion for teaching and commitment to meeting student needs, a need for additional resources and training, and a disconnect between families and schools. Interpretation of these findings through Hornby’s (2015) theory of inclusive education suggests that Belize is primarily following inclusivity as students with disabilities are integrated into the mainstream educational system. However, while some principles and practices of inclusion are followed, other features are absent. Adding a special education component could enhance student learning as individualization and standardization of instruction, expectations, and assessment could occur between teachers, across grade levels, and in communication with families. A special education component with associated teacher training could support teacher desire for additional resources and meet the needs of an increasingly diverse population of students.

Keywords: inclusive special education, special educational needs and disabilities (SEND), community-engaged research, teaching practices, primary education

Introduction

In recent years, the government of Belize has prioritized and invested heavily in education (Naslund-Hadley et al., 2013) and has set an important national goal of ensuring “all children [of Belize] are given the opportunity to acquire the knowledge, skills, and attitudes required for full and active participation in the development of their community and for their own personal development” (MOE,
2000, p. 109). To achieve this goal, Belizean law requires all children from ages five through fourteen to attend at least eight years of primary school. Teaching and learning are guided by MOE’s national standardized curriculum, and, according to the MOE’s *Handbook of Policies and Procedures for School Services* (MOE, 2000), teaching and learning must promote all aspects of each child’s development as embodied in national educational goals.

**Structure of Primary Education in Belize**

Belize’s educational system, a loose aggregate of education sub-systems, is based on the British model and divided into three levels: primary, secondary, and tertiary (Merrill, 2008, p. 213). Primary education includes provisions for private, church-state partnerships, and government education. In church-state partnerships, the government pays the full salary of all teachers at the primary level while denominational directors manage schools. In contrast, MOE schools are both funded and managed by the government. Both church-state and MOE schools are located throughout the country’s six districts: Corozal and Orange Walk in the north, Belize in the center, Cayo to the west, and Stann Creek and Toledo in the south.

In 2018, 294 primary schools in Belize employed 2,949 teachers (MOE, 2018). Historically, teacher certification has not been required for employment, resulting in many children being taught by teachers who lacked professional training (Belize, n.d.; Lopez, 2012). Currently, approximately 70% of teachers are professionally trained, but that number is growing with recent amendments to the Education Act of 2010. These amendments aim for 100% of teachers to be professionally trained as a requirement to obtain a teacher’s license (MOE, 2018). However, according to statistics published by the MOE (2019), 73,814 children were enrolled in Belizean preschool and primary schools in 2017-2018 with only 46.8% of preschool children and 79.2% of primary school children taught by trained teachers. In Belize, teacher preparation involves formal training in teaching methods, child development, classroom organization and management, instructional aids, and testing and measurement. However, significant differences exist regarding preparation opportunities for teachers in rural versus urban schools, with limited training opportunities in remote areas of Belize. The average class sizes in Belize are 23 students in primary school classrooms and 16 students in secondary school classrooms (MyBelize, 2015). Additionally, rural school attendance is lower than attendance in urban areas with only 91% of primary-aged students attending school in rural areas compared to 93% of primary-aged students in urban areas (Naslund-Hadley et al., 2013).

Even with enhanced expectations and training for teachers, little attention has been given to preparing teachers to work with student populations with diverse needs, especially students with cognitive or physical challenges. Although the MOE has begun to offer professional development to Belizean teachers through its Teacher Learning Institute (The Ministry of Education, Culture, Science and Technology, 2021), little emphasis has been placed on professional development that specifically targets teacher capacity to work with special needs students. Additionally, the opportunity to engage in professional development remains elusive to many educators, especially those in remote areas where transportation, limited internet access, and financial restraints often influence teacher access to these important resources.
**Problem Statement**

The MOE is charged with ensuring that all Belizeans are given an opportunity to acquire a quality education that promotes personal development and productive citizenship. The mission of MOE is to provide equitable access to and efficiently deliver quality and relevant education, at all levels, for all Belizeans, and is founded on the integrated principles of education for self, for strength, and life (MOE, 2000). Additionally, Belize has signed and ratified the United Nations’ Convention on the Rights of a Child and the Convention on the Rights of Persons with Disabilities, which aim to change attitudes and approaches toward persons with disabilities (United Nations, 2022). These commitments align with the MOE’s emphasis on meeting the needs of all children. However, although the MOE strives to promote educational opportunities for all students, including students with special needs who have historically often been left out of the education system, many Belizean teachers have struggled to meet the needs of these students with learning disabilities in these inclusive settings (MOE, 2019).

**Purpose of the Study**

Because many primary school teachers in Belize lack professional training, issues of lack of content knowledge, pedagogical skills, and assessment literacy continue to surface, especially regarding inclusive classrooms that require teachers to meet the needs of an increasingly diverse student population. Therefore, the purpose of this study was to explore teaching strategies and contextual factors in inclusive primary classrooms in Belize as teachers strive to meet the needs of students. This study addressed the following research questions:

- What teaching strategies do teachers implement to meet the needs of students with special educational needs and disabilities (SEND) in inclusive classrooms in Belize?
- What challenges must teachers address when working to meet the needs of SEND students?
- How is family-school-community engagement utilized in inclusive classrooms in Belize to meet the needs of SEND students?

**Theoretical Framework and Literature Review**

**Hornby’s Theory of Inclusive Special Education**

Since the 1990s, inclusion has become a topic of interest in educational practice on national and international levels (UNESCO, 2020). However, understandings and practices of inclusion remain elusive and vary significantly (Norwich, 2008; 2014). For example, Giangreco and Suter (2015) argued for a clearer conceptualization of inclusion through multi-tiered systems of support (MTSS), emphasizing both academic and behavioral supports through schoolwide response to intervention (Sailor, 2009), as well as institutionalized positive behavior interventions and supports (Sugai & Horner, 2009). Furthermore, as K-12 classrooms have become increasingly diverse in the last few decades, educators have looked to adaptable models of inclusion to best meet the needs of students. Universal Design for Learning (UDL) emerged as one such consideration (Center for Applied Special Technology, 2018). The UDL model addresses diversity and inclusion by supporting academic and social success of all students through research-based instructional methods that correspond with each individual student’s unique learning challenges and personal strengths (Hasselbring et al., 2005). This approach provides educators the desired flexibility to meet the needs of students at varying ability...
levels by incorporating differentiated instruction, technological tools, and collaborative partnerships (Evans et al., 2010). Toward this end, Hornby (2015) suggested that inclusive education is “the most controversial issue currently regarding the education of children with SEND (p. 234).” For example, on one end of the continuum, scholars broadly define inclusion and link it with notions of social diversity and the integration of all students in the educational community (Anastasiou & Kauffman, 2012). Certain values accompanying this view include access and quality, equity and social justice, and democratic participation which “can lead to significant ambiguities and tensions” (Norwich, 2014, p. 496).

On the opposite end of the continuum, inclusion and focus are narrowly defined exclusively as the education of students with diverse learning needs. While the former group emphasizes social integration and diversifying the collective learning environment, the latter stresses improving the education of only those SEND students. Others question the efficacy of inclusive education by questioning its value for students with cognitive or physical challenges as well as regular education students (Cooper & Jacobs, 2011; Kauffman & Hallahan, 2005). Hornby (2014; 2015) concluded that the primary reason for misunderstandings and varied practices of inclusion results from the fact that inclusive education and special education are based on diametrically opposed philosophies and provide conflicting approaches to educating children with SEND. He consequently developed a theory of inclusive special education which synthesizes “the philosophies, policies, and practices of both inclusive education and special education in order to present a clear vision of effective education for all children with SEND” (Hornby, 2015, p. 236). Importantly, his theory accounts for both the educational improvement for SEND students and the transformation of mainstream learning. Hornby’s theory of inclusive special education ensures that children with SEND receive an effective education through placement in the most appropriate environment across all grade levels. Included in the theory are guidelines for procedures and evidence-based teaching strategies to meet their learning needs. The theory includes as many children as effectively possible in conventional education and makes available a continuum of placement options that range from mainstream classes to special schools (Hornby, 2015). These elements of inclusive special education are summarized below.

**Evidenced-Based Practices: Special Education and Inclusive Education**

Special education is typically characterized by individualized assessment and planning, specialized instruction, evidence-based practices, and individualized student assessment (Hornby, 2015). Standard practices in special education include mastery learning, assessment strategies, individual education programs (IEP), and differentiated instruction, which focus on student strengths and help teachers adapt different instructional needs (Carroll, 1989). Inclusive education, in contrast, is characterized by a philosophy of acceptance and belonging, school-community collaboration, and valuing the education of all learners in diverse, mainstream classrooms (Hornby, 2015; Salend, 2011). Inclusive education typically emphasizes human rights, social justice, and equity (Hornby, 2015). Hornby (2015) posited that implementing the preeminent, evidenced-based practices inherent in both special education and inclusive education fosters acceptance of diverse abilities and the use of strengths-based approaches for all students.

**Continuum of Placement Options From Mainstream Classes to Special Schools**

Inclusive special education acknowledges a wide range of needs and preferences of children with SEND. Those with fewer needs can be effectively educated in conventional environments with
minimal assistance, while those with higher levels of SEND can better benefit from more specialized settings. Hornby (2015) posited that a continuum of options should be offered that include mainstream classrooms with support from specialist teachers or teaching assistants from resource rooms or special classes within mainstream schools to separate, special schools (Hornby, 2015, p. 248). He suggested a typical continuum of options as displayed in Figure 1.

**Figure 1. Continuum of Classroom Options for Children with SEND**

<table>
<thead>
<tr>
<th>Mainstream class, Differentiation by class teacher</th>
<th>Residential special school on its own campus</th>
</tr>
</thead>
<tbody>
<tr>
<td>Mainstream class with guidance for the teacher provided by a special education teacher or teaching assistant.</td>
<td></td>
</tr>
<tr>
<td>Mainstream class with some time spent in a resource room.</td>
<td></td>
</tr>
<tr>
<td>Special class within a mainstream school.</td>
<td></td>
</tr>
<tr>
<td>Special class part of a special school but attached to a mainstream school.</td>
<td></td>
</tr>
<tr>
<td>Special school on same campus as a mainstream school.</td>
<td></td>
</tr>
</tbody>
</table>

*Source.* Developed by authors based on Hornby’s (2015) Theory of Inclusive Special Education

**Education in the Most Appropriate Setting Through All Stages of a Child’s Education**

A continuum of placement options provides seamless integration of children with SEND in appropriate settings during all stages of a child’s education. For example,

A child may begin their education in an early intervention program along with other children with high levels of SEND and when school age is reached, transfer to a mainstream primary school class, perhaps with support from a specialist support teacher or teaching assistant. Later, the child may transfer to a resource room or special class within a middle school and, later still, transfer to a special school to complete their education. Alternatively, a child may spend time attending a special school and later be transferred to a resource room or special class within a mainstream school or to a mainstream classroom with specialist support (Hornby, 2015, p. 249).

According to Hornby (2015), schools must be flexible in these options and work with parents, special education specialists, and mainstream educators to ensure the best placement throughout the child’s academic career.

**Organization for Providing Optimal Education for All Children With SEND**

Hornby (2015) suggested the following procedures for meeting the needs of students with SEND (see Figure 2).

- A comprehensive national policy must be in place based on “inclusive special education and backed by legislation that specifies the rights of children with SEND and their families” (p. 249).
- Schools must ensure that these national policies are contextually implemented.
- Special education teams should be in place that includes school staff trained in inclusive special education, psychologists, and other pertinent specialists.
- Researched-based practices of inclusion should guide all schoolwide activities.
- Educators must be able to identify children with SEND and ensure that teaching an assessment strategy is developmentally appropriate for each student.
**Methods**

The design for this study is a qualitative case study conducted in the form of community engaged research in partnership with the MOE. Community engaged research creates and disseminates knowledge and creative expression to contribute to the discipline and strengthen the well-being of the community (Virginia Commonwealth University, 2020). It also identifies the assets of stakeholders and incorporates them in the design and conduct of the research process. A community engaged research design provided a platform for collaboration to understand this complex educational problem and the culture where it is situated. The case identified for this study included Belizean primary schools that practiced inclusion during the 2019-2020 school year. This study utilized multiple sources of data (Yazan, 2015) including observations, participant interviews through Zoom technology, document analysis, and survey data to gain a better understanding of teaching practices utilized in Belizean-inclusive primary school classrooms.

**Sample and Data Collection**

Purposeful sampling was utilized to identify participants. All primary school teachers from schools that practice inclusion in each of the six districts in Belize were selected to receive an email survey. The survey was sent to the email addresses of 233 elementary teachers across Belize. Thirty-three emails were returned as undeliverable, so the email list was corrected with updated email information. Thirty email addresses were updated, reducing the total sample to 230 potential participants. Of the 230 surveys distributed, 88 responses were received, indicating a 38% response rate. Survey data described the population and helped inform qualitative findings. The data also served to purposefully select interview participants from the pool of participants that completed the survey. Survey data were collected in the Fall of 2019 and Spring of 2020 before Belize experienced school closures caused by the pandemic.
Following the collection of survey data, in the Spring and Summer of 2020, three primary school teachers from each of the districts of Toledo, Stann Creek, Orange Walk, and Cayo and four primary school teachers from both Belize and Corozal districts were randomly chosen for the interview portion of this study, for a total of 20 interview participants. Random selection from each district helped to meet the goal of understanding educators' perspectives on their preparation to meet the needs of a diverse student population. Merriam and Tisdell (2016) allowed for surveys and other quantitative data as data sources when used for descriptive rather than predictive purposes. Interviews following a semi-structured interview protocol were audio recorded and transcribed. In-person interviews and observations were not possible due to COVID-19 travel restrictions. Consequently, interviews were conducted through Zoom and during each interview, teachers were asked to provide a virtual tour of their physical classroom settings and to describe their students. Field notes were taken as each teacher conducted the virtual tour and described the differentiation of instruction and style of interaction with students. Documents collected included lesson plans, samples of packets sent home to students to complete during school closures, school policy, and MOE documents regarding maintaining an inclusive classroom.

**Data Analysis**

Quantitative descriptive data and qualitative data were analyzed according to a modified convergent design approach described in Merriam and Tisdell (2016) where each data source provided mutually reinforcing insight into the study. Descriptive statistics were calculated for survey data using IBM SPSS statistical analysis software (v. 26) to gain a better understanding of the research population. Qualitative data analysis began simultaneously with data collection, allowing a constant comparative approach (Merriam, 2002). The simultaneous consideration and analysis of quantitative and qualitative data involved “consolidating, reducing, and interpreting what people have said and what the researcher has seen and read [for] the process of making meaning” (Yazan, 2015, p. 148) to identify codes that emerged. Following open coding, categories were created using axial coding techniques. Salient themes were identified by each researcher. Following data analysis, researchers convened to discuss emergent themes, which included the following: differentiation practices, passion for teaching and commitment to meeting student needs, need for additional resources and training, and a disconnect between families and schools. Triangulation was used to identify potential alternative interpretations of findings.

**Findings**

Descriptive data provided an understanding of teacher perspectives regarding their preparedness for meeting the needs of students with learning differences in their classrooms. The survey consisted of 10 items using a six-point Likert-type response set ranging from (1) *Strongly disagree* to (6) *Strongly agree*. A six-point Likert response set required participants to either agree or disagree with a statement, as a neutral option was not provided. Teachers were asked to reflect upon their preparedness to meet the needs of all students in their classrooms and to respond to the six-point Likert response set regarding how much they agreed or disagreed with the statement. These items helped to explain the learning conditions that teachers experience in their classrooms. Findings from this survey are displayed in Table 1.
Table 1. Teacher Perspectives of Preparedness to Meet the Needs of All Students

<table>
<thead>
<tr>
<th>Statement</th>
<th>M</th>
<th>SD</th>
<th>Variance</th>
</tr>
</thead>
<tbody>
<tr>
<td>I experience differences in learning needs among students in my classroom.</td>
<td>5.33</td>
<td>1.30</td>
<td>1.70</td>
</tr>
<tr>
<td>Students come to my class ready to learn.</td>
<td>2.99</td>
<td>1.17</td>
<td>1.37</td>
</tr>
<tr>
<td>I differentiate instruction to meet the needs of students in my classroom.</td>
<td>4.83</td>
<td>.83</td>
<td>.69</td>
</tr>
<tr>
<td>I feel prepared to meet the needs of students in my classroom.</td>
<td>4.32</td>
<td>1.07</td>
<td>1.15</td>
</tr>
<tr>
<td>I have received training to know how to differentiate instruction to meet my student’s needs.</td>
<td>4.10</td>
<td>1.23</td>
<td>1.52</td>
</tr>
<tr>
<td>It is important for teachers to receive training to learn to differentiate instruction.</td>
<td>5.81</td>
<td>.54</td>
<td>.29</td>
</tr>
<tr>
<td>I understand the learning needs of my students, especially those who are struggling academically.</td>
<td>4.77</td>
<td>.97</td>
<td>.95</td>
</tr>
<tr>
<td>I feel successful at meeting the needs of all students in my classroom.</td>
<td>3.90</td>
<td>1.16</td>
<td>1.34</td>
</tr>
<tr>
<td>I feel frustrated or discouraged when I try to meet the needs of all of my students.</td>
<td>3.77</td>
<td>1.36</td>
<td>1.86</td>
</tr>
<tr>
<td>I am offered training opportunities to learn to meet the needs of students in my classroom.</td>
<td>3.25</td>
<td>1.54</td>
<td>2.37</td>
</tr>
</tbody>
</table>

Further analysis of data revealed differences in perceptions across teachers in rural schools and urban schools. An independent samples t-test comparing the means of the urban and rural teachers was run using SPSS. While the overall sample size was adequate (N = 88), there was not an equal representation of urban and rural teachers in the sample. This limitation should be taken into consideration when analyzing the findings. Using Levene’s test, equal variance for all items was assumed minus the second item. At large, the perception of Belizean teachers regarding meeting the needs of diverse students was similar compared to rural and urban teachers. However, the data suggested that urban teachers may experience a greater sense of preparedness, access to training, and efficacy around successfully differentiating instruction and meeting the needs of all students. This is supported by the significance and marginal significance of the difference in the means between urban and rural teachers across the following two items: I feel successful at meeting the needs of all students in my classroom and I am offered training opportunities to learn to meet the needs of students in my classroom. These findings are presented in Table 2.

Table 2. Teacher Perspectives on Meeting the Needs of All Students (Urban vs. Rural)

<table>
<thead>
<tr>
<th>Statement</th>
<th>Urban M</th>
<th>Urban SD</th>
<th>Rural M</th>
<th>Rural SD</th>
<th>Sig. (p &lt; .05)</th>
</tr>
</thead>
<tbody>
<tr>
<td>I experience differences in learning needs among students in my classroom.</td>
<td>5.29</td>
<td>1.36</td>
<td>5.34</td>
<td>1.31</td>
<td>.90</td>
</tr>
<tr>
<td>Students come to my class ready to learn.</td>
<td>3.00</td>
<td>.94</td>
<td>2.99</td>
<td>1.24</td>
<td>.96</td>
</tr>
<tr>
<td>I differentiate instruction to meet the needs of students in my classroom.</td>
<td>5.12</td>
<td>.86</td>
<td>4.76</td>
<td>.82</td>
<td>.11</td>
</tr>
<tr>
<td>I feel prepared to meet the needs of students in my classroom.</td>
<td>4.65</td>
<td>1.00</td>
<td>4.24</td>
<td>1.09</td>
<td>.16</td>
</tr>
<tr>
<td>I have received training to know how to differentiate instruction to meet my student’s needs.</td>
<td>4.41</td>
<td>1.37</td>
<td>4.03</td>
<td>1.21</td>
<td>.26</td>
</tr>
<tr>
<td>It is important for teachers to receive training to learn to differentiate instruction.</td>
<td>5.76</td>
<td>5.82</td>
<td>.44</td>
<td>.57</td>
<td>.72</td>
</tr>
<tr>
<td>I understand the learning needs of my students, especially those who are struggling academically.</td>
<td>4.94</td>
<td>4.73</td>
<td>.75</td>
<td>1.03</td>
<td>.43</td>
</tr>
<tr>
<td>I feel successful at meeting the needs of all students in my classroom.</td>
<td>4.41</td>
<td>1.12</td>
<td>3.77</td>
<td>1.15</td>
<td>.04**</td>
</tr>
<tr>
<td>I feel frustrated or discouraged when I try to meet the needs of all of my students.</td>
<td>3.53</td>
<td>3.83</td>
<td>1.38</td>
<td>1.37</td>
<td>.42</td>
</tr>
<tr>
<td>I am offered training opportunities to learn to meet the needs of students in my classroom.</td>
<td>3.88</td>
<td>3.10</td>
<td>1.65</td>
<td>1.50</td>
<td>.06*</td>
</tr>
</tbody>
</table>

Source: Rural: Toledo, Stann Creek, Orange Walk, and Cayo; Urban: Belize and Corozal; Urban N = 17; Rural N = 71; *Marginally Significant = .06; **Sig. (p < .05)

Survey participants were also asked to answer three open-ended questions. These questions asked teachers to (1) identify their greatest challenges in meeting the needs of all students, (2) list specific techniques used to differentiate instruction, and (3) identify additional learning or professional development opportunities they would like to be made available to them. Concerning the greatest challenges, teachers identified a lack of resources, parental support, large class sizes, and time as their greatest challenges. Findings from the first question are provided in Table 3.
Table 3. Greatest Challenge in Meeting Students Needs (Identified by Teachers)

<table>
<thead>
<tr>
<th>Identified Challenge</th>
<th>Number of Responses</th>
<th>% Who Identified this Challenge</th>
</tr>
</thead>
<tbody>
<tr>
<td>Need for resources (technology, manipulatives, materials, and supplies)</td>
<td>36</td>
<td>41%</td>
</tr>
<tr>
<td>Lack of parental support</td>
<td>18</td>
<td>20%</td>
</tr>
<tr>
<td>Time</td>
<td>17</td>
<td>19%</td>
</tr>
<tr>
<td>Large class sizes/small classrooms</td>
<td>16</td>
<td>18%</td>
</tr>
<tr>
<td>Lack of training to meet diverse student needs</td>
<td>15</td>
<td>17%</td>
</tr>
<tr>
<td>Large number of students with differentiated learning needs in my classroom</td>
<td>7</td>
<td>8%</td>
</tr>
<tr>
<td>Students not coming to school prepared to learn (incomplete homework, not well rested or fed)</td>
<td>6</td>
<td>7%</td>
</tr>
<tr>
<td>Lack of administrator support</td>
<td>6</td>
<td>6%</td>
</tr>
<tr>
<td>Low student motivation</td>
<td>5</td>
<td>6%</td>
</tr>
<tr>
<td>Multigrade classrooms</td>
<td>5</td>
<td>6%</td>
</tr>
<tr>
<td>Student behavior</td>
<td>4</td>
<td>5%</td>
</tr>
</tbody>
</table>

The next open-ended survey item was, *What are the techniques that you use to differentiate instruction to meet the needs of students who are experiencing academic challenges?* Individualized instruction and assignments, use of visual aids such as videos, games and PowerPoint presentations, and ability grouping were the most commonly practiced techniques utilized by participants. Participant responses to this question are provided in Table 4.

Table 4. Identified Teacher Techniques for Differentiating Instruction

<table>
<thead>
<tr>
<th>Identified Technique</th>
<th># of Responses</th>
<th>% Who Identified this Technique</th>
</tr>
</thead>
<tbody>
<tr>
<td>Individualized instruction</td>
<td>28</td>
<td>32%</td>
</tr>
<tr>
<td>Individualized assignments/assessments</td>
<td>23</td>
<td>26%</td>
</tr>
<tr>
<td>Visual aids; videos, games, PowerPoint</td>
<td>23</td>
<td>26%</td>
</tr>
<tr>
<td>Ability grouping</td>
<td>21</td>
<td>24%</td>
</tr>
<tr>
<td>Manipulatives</td>
<td>14</td>
<td>16%</td>
</tr>
<tr>
<td>Peer tutoring/mixed ability grouping</td>
<td>13</td>
<td>15%</td>
</tr>
<tr>
<td>Peer share/reading buddies</td>
<td>9</td>
<td>10%</td>
</tr>
<tr>
<td>Specialized curriculum</td>
<td>8</td>
<td>9%</td>
</tr>
<tr>
<td>After school teaching</td>
<td>7</td>
<td>8%</td>
</tr>
<tr>
<td>Reading test questions or assignments aloud to student</td>
<td>3</td>
<td>3%</td>
</tr>
<tr>
<td>Drama, role play</td>
<td>3</td>
<td>3%</td>
</tr>
<tr>
<td>Additional time</td>
<td>3</td>
<td>3%</td>
</tr>
<tr>
<td>Repetition/extra practice, critical thinking questions, scaffolding</td>
<td>2 responses each</td>
<td>2%</td>
</tr>
<tr>
<td>Outdoor learning, stations, retesting, storytelling, sign language</td>
<td>1 response each</td>
<td>1%</td>
</tr>
</tbody>
</table>

The third open-ended survey item asked, *What additional opportunities for learning would you like to be made available for you?* Participants strongly identified the need for additional training to both identify and serve students with cognitive or physical learning challenges. Responses are provided in Table 5.

Table 5. Identified Teacher Needs for Additional Training

<table>
<thead>
<tr>
<th>Type of Training</th>
<th>Number of Responses</th>
<th>% Who Recommended this Training</th>
</tr>
</thead>
<tbody>
<tr>
<td>Working with students who have diverse needs, Identifying students with specific needs</td>
<td>38</td>
<td>43%</td>
</tr>
<tr>
<td>Use of manipulatives</td>
<td>7</td>
<td>8%</td>
</tr>
<tr>
<td>Use of technology in teaching</td>
<td>3</td>
<td>3%</td>
</tr>
<tr>
<td>How to teach in a multi-grade classroom</td>
<td>3</td>
<td>3%</td>
</tr>
<tr>
<td>Sign language</td>
<td>2</td>
<td>2%</td>
</tr>
<tr>
<td>Teaching reading</td>
<td>2</td>
<td>2%</td>
</tr>
<tr>
<td>Teaching writing</td>
<td>2</td>
<td>2%</td>
</tr>
<tr>
<td>Classroom management</td>
<td>2</td>
<td>2%</td>
</tr>
<tr>
<td>Teaching students who speak English as a second language</td>
<td>2</td>
<td>2%</td>
</tr>
<tr>
<td>Specific Workshop (Kagan Workshop; Real Life Teaching)</td>
<td>2</td>
<td>2%</td>
</tr>
<tr>
<td>Phonological awareness</td>
<td>1</td>
<td>1%</td>
</tr>
<tr>
<td>Teaching math (interactive math)</td>
<td>1</td>
<td>1%</td>
</tr>
</tbody>
</table>
Interviews

Four major themes emerged from the findings from the data analysis of the qualitative portion of the study: (a) differentiation practices, (b) passion for teaching and commitment to meeting student needs, (c) need for additional resources and training, and (d) a disconnect between families and schools. Each of these themes is explained below.

Differentiation Practices

Participants explained their differentiation practices in two primary ways: ability grouping and allowing extra time for assignment completion. Ability grouping was described in different ways. For example, some teachers explained that as students in their classrooms work in groups, the students with learning challenges would often be paired with a higher-performing student who could serve as a mentor. This type of peer mentoring or peer tutoring was quite common across classrooms. One teacher explained, “I just can’t get to them all, and this [peer tutoring] helps with the instruction.” Teachers also grouped all learning-challenged students together, with higher-performing students and lower-performing students working in separate groups. Teachers explained that this type of grouping provided the opportunity to assign different levels of reading or math assignments based on the needs and skills of students in the group.

A second method of differentiation described by participants was individualized instruction, assignments, and assessments. Teachers explained how they often allow students with learning challenges to have additional time to complete assignments. To provide individualized instruction, teachers frequently stay after school to work with students. One teacher explained, “It just takes so much time to help these students. Sometimes I stay after class to help, and sometimes I work with them alone in class while other students are working.” When asked about specific individualized instruction strategies, answers varied. One participant explained that she reads assignment instructions aloud to students. Another stated, “I simplify instructions. . . in a way, they will understand. I don’t make them do all of the problems.” Assessments were individualized by giving oral examinations, shorter quizzes and tests, and allowing students to explain concepts to teachers in their own words.

Passion for Teaching and Commitment to Meeting Student Needs

During the interviews, the teachers in the sample clearly displayed a passion for teaching and an overwhelming commitment to meeting the needs of all students. Many of the participants referred to their students as mine or my children. There was often a parental tone, and some teachers mentioned that they often kept up with students even after they left their classrooms. When asked how they addressed the challenge of working with students struggling with writing or higher-order skills, one teacher responded, “I stay positive and give perspective, I counsel because I am a mom. I try and listen and lend my ears to them because they come from very broken families.” Evidence of their commitment and “going the extra mile” abounded. Almost all teachers in the sample had over 15 years of experience with some over 30. One participant, who had started teaching in 1989, spoke of how teaching practices have changed over the years, and yet she still was eager to grow and improve. “I have to work harder to motivate children today, and now it’s more challenging because technology can be distracting when used improperly. I still consider myself old-school, but not too old to learn new things!”
Need for Additional Training and Resources

All participants were committed professionals with insights, ideas, and aspirations on how to best serve all students in their classrooms. They expressed a desire for pertinent, ongoing, and sustainable professional development dealing specifically with students with SEND. They suggested that professional development should be designed to benefit all classroom teachers who have to SEND in their classrooms as well as school administrators. Participants particularly expressed a need for professional development that includes hands-on strategies directly applicable to the unique cultural contexts of their schools, and they expressed interest in problem-based learning and collaboration. Networking across schools and even across districts was another component of this theme.

A Disconnect Between Families and Schools

The final emergent theme was a disconnect between families and schools. This separation, while evident before COVID-19, was exacerbated by the social distancing effects of the pandemic. As the pandemic forced learning to take place in homes, the teachers in our sample voiced the challenges of sending packets home for distance learning and the disappointment when packets were either not returned to the school or returned incomplete. Per the experience of the interviewed teachers, at-home learning proved to be particularly difficult in the most remote or rural school communities where the parents’ education levels tended to be more limited. In many of these remote areas, parents of school-aged children were older than the inception of the school itself and, therefore, did not have the same access to education. One teacher who worked in a remote school noted that the school where he teaches only started in 1996 and that “some family members have never even been to a school.” At the time of the interview, this school had been closed since March 2020 and distance (at-home) learning had been particularly challenging.

For almost all teachers in our sample, the pandemic was the first time they had to think through distanced learning, and working with parents and families was noted as very challenging. One teacher shared his experience with trying first to teach parents the lessons so that they could teach their children at home. He stated, “When we give the content with distance learning, we have to give examples, setting specific times for parents to come to the school to pick up the packets and to first learn the material.” Interview data suggest that distance learning and having to teach parents first has been incredibly exhausting and time-consuming. As mentioned by one teacher, “Right now, the biggest challenge is not having the children here and knowing that some children don’t have parents that can help their children. Preparing work now is more work than if the children were in the classroom.”

In addition to the educational disparities between parents and their children and the corresponding level of academic support they are able to provide, families in these remote communities are facing an economic crisis caused by the pandemic. One teacher communicated, “Our parents and families don’t have jobs to support their families. They depend on farming, and during the pandemic, there has been nowhere to sell their products.” As expected, this economic depression has affected motivation and engagement and has only widened the gap between families and schools. In response, we found that the teachers in our sample were the ones “going the extra mile” to try to bridge this divide often at their own expense. One teacher stated, “There is no electricity in this community, basic materials most of the time have to be provided by me or my partner teacher reaching into our own
pockets.” Teachers using their own means to provide classroom and teaching materials for their students was a prevalent theme throughout this study.

Finally, we found that there seemed to be an increasing distrust of parents being equipped to adequately meet the needs of their students. In particular, teachers had more of a growing mistrust of younger parents than older parents. This finding was more prevalent in urban schools. One teacher commented, “Parents used to be more responsible, I have a lot of young parents nowadays.” Teachers expressed growing frustration with some of the teachers indicating that some of their student’s parents were disengaged and not actively present in their child’s life or education. One teacher stated, “I think children need counseling due to the lack of parenting. Students want to speak with me because I will listen to their problems.” Another participant suggested that offering parenting classes could potentially be helpful before children were accepted at the school. She noted that “right now a lot of the parents are young, and it’s almost like the children are leading the children; We have to keep the communication open with parents.” There did seem to be more involvement with parents of children in the younger grades, but as students progressed into standards 4, 5, and 6, parent participation diminished.

Research Questions Answered

Teaching Strategies to Meet the Needs of Students With SEND in Inclusive Classrooms

Responses to questions about differentiation practices used in classrooms in survey data and interview data were very similar. Responses during interviews identified the most common strategies as ability grouping and allowing additional time for assignments and assessments. Responses in survey data included individualized instruction, assessment, assignments, and ability grouping. In survey data, teachers mentioned specific techniques such as pair/share and reading buddies. An additional differentiation technique identified in survey data was the use of visual aids such as videos, games, PowerPoint presentations, and manipulatives. During interviews, teachers placed a tremendous emphasis on the amount of time spent helping students with different learning needs.

Challenges Teachers Must Address When Working to Meet the Needs of Students With SEND

Survey data indicated the primary challenges teachers experience working with students with SEND include the need for additional resources, lack of parental support, limited time, large class sizes, and a lack of training to identify and meet the needs of SEND. A discussion of each challenge follows.

Lack of Resources

Teachers explained they often purchase materials for SEND students from their own finances including games, manipulatives, books, and technology. One teacher explained, “I am here for the kids; I try to find what they need.” Another stated, “It is my responsibility to ensure that they learn. I bought books, especially for him.” For this teacher, finding a book in braille met the needs of her student. She indicated that the student would feel “rejected” if she did not supply some resources to meet his needs. Another teacher explained that his parents help him financially when he needs additional resources or supplies for his classroom. He explained, “They help when they can. I can’t always afford what my students need.” Another teacher stated, “It is what is expected from us. We have to spend some of our money. It’s our job. We want what’s best for our students.”
Lack of Family Engagement

An additional challenge mentioned in the survey and interview data is the lack of engagement between families and schools with the pandemic enhancing the challenge of disengaged parents. Teachers explained that, at times, students did not return required homework packets during school closures. Additionally, teachers explained they often had to rely on the teacher from the previous year to understand a child’s learning needs. One participant explained, “I can’t always talk with the parent. I have to ask the previous teacher [about what worked and did not work].” Findings suggested that distance between families and schools enhances the challenge of working with SEND students. Families are often not equipped to support learning at home, and teachers assume the responsibility of bridging this gap.

Limited Time and Large Classroom Sizes

Limited time and large classroom sizes were also mentioned in both the survey and interview data. One participant explained that she had 25 students, 17 boys and eight girls, in her classroom. She explained, “The classroom is very small. We do not have much room for all of these students.” In addition, another participant indicated that she consistently has 30 students in her classroom. Teachers expressed concern about having the time and space to meet the needs of students “when so many of them have challenges, both academically and emotionally.” One participant also explained, “We do not have a ‘say’ in [student placement in their classes]. It’s what they give us.” Another stated, “If we get them, we have to try our best.” In other words, teachers felt that they were required to meet the needs of all students regardless of student ability and large class sizes.

Interview participants were supportive of MOE and expressed appreciation for the support provided. One participant explained the MOE provides diagnostic screening and provides “a clear idea of where to start and where to meet the child.” However, this participant explained that it is typically the classroom teacher’s responsibility to design daily instruction to meet the needs of students in the classroom and that the challenges of limited space and large student numbers were challenges that she faced daily.

Training Needed to Meet the Needs of SEND

Teachers expressed appreciation for workshops and training provided by MOE. One participant mentioned literacy training that had supported her work with students. Another participant mentioned a class that all teachers are required to have to earn teaching credentials; however, this training included limited information regarding how to work with SEND students. Despite the training received, participants indicated a strong desire to continue learning. Specific topics of interest included how to meet student emotional needs, how to work with students who exhibit hyperactivity, learning braille to work with students who are visually impaired or blind, and additional training on how to differentiate instruction to meet the needs of students. A teacher who was teaching a sight-impaired student explained, “I am not prepared to teach braille, but I would learn it. If we don’t meet their needs, students feel as if they are being rejected.” Another participant when asked how prepared she felt to work with SEND students explained, “I may know some, but not all. I am willing to learn.” Another expressed her desire for continual learning by stating, “Not everyone will go the extra mile, but I will. These are my kids.” Differences in the accessibility of training were noted between teachers in urban and rural schools. Teachers in remote areas indicated greater difficulty finding the support
they need. Additionally, teachers mentioned that advanced training and effort are not recognized in teacher evaluations. These teachers explained, “I work hard, and I do what I can to meet the needs of my students. Those efforts don’t always show up on my evaluations.”

**Family-School-Community Engagement in Inclusive Classrooms to Meet SEND**

This element is best addressed through the challenge that participants expressed as a lack of family engagement. Participants valued interaction with families and eagerly sought parent participation. Participants also indicated that school leaders and the MOE highly value school-family collaboration. However, teachers expressed a disconnect with families and explained it was intensified through school closures associated with the pandemic. Teachers described some parents as *very young*. They do not understand [how to work with the school]. One teacher explained, “Parents do cooperate; I just have a difficult time reaching them.” Additionally, teachers explained that families without prior school experience exhibited difficulty in helping their children at home. At times, these teachers felt they needed to educate the parent so that, in turn, the parent could help their children. These challenges influenced teacher ability to meet the needs of SEND in their classrooms. Teachers explained that without training and resources and with large class sizes and small classrooms, the additional challenge of family disengagement was sometimes *overwhelming*. Despite these challenges, these teachers expressed passion for their work and their students. They indicated that they would “do whatever it takes” to meet the needs of their students.

**Discussion and Conclusions**

Interpretation of these findings through Hornby’s (2015) theory of inclusive education suggests that Belize is primarily following inclusivity in the sense that students with disabilities are integrated into the mainstream educational system. However, while some principles and practices of inclusion are followed, other important features are absent. Evidence of inclusivity exists in the placement of all students in mainstream classrooms; however, limited opportunity exists for differing instruction, ways of knowing, or engagement with the material—all key components of UDL. Teachers who expressed, “We don’t have a ‘say’ in [which students are assigned to our classrooms]; it’s what they give us” and “If we get them, we have to try our best [to meet the needs of the student]” suggest that limited emphasis is placed on *how* the student needs will be met in these inclusive classrooms, but rather *where* the student needs will be met. The integration of UDL principles into these classrooms could promote an inclusive environment that benefits these students and eliminates unnecessary hurdles in the learning process. For example, allowing students to express their learning or to engage with the material in multiple ways could enrich learning experiences for all students, not just those with identified needs (Cornell University, n.d.). A purposeful design for the learning environment that provides options for perception, expression, and engagement could motivate students and enhance learning outcomes for all (Cornell University, n.d.; Rao et al., 2017). In addition, providing a system of support based on MTSS principles that include academic, behavioral, social, and emotional needs could provide the scaffolding needed to promote student success (Rosen, n.d.). While some diagnostic testing is available to identify student needs, teachers are responsible for planning and implementing differentiation techniques to meet those needs. With limited training and resources available, teachers appear to be doing their best to meet student needs, often reaching into their own pocketbooks and working long hours to support student learning. MTSS includes a systems-wide approach to include needed specialists to help with assessment and intervention (Rosen, n.d.).
Teachers who stated that they are “doing their best,” indicated they are not convinced the techniques they are using are promoting the best learning opportunities for students.

The inclusion model these teachers are using emphasizes the values of diversity and differences through the implementation of techniques such as peer tutoring and collaborative learning. However, findings suggested that ability grouping was one of the primary methods of differentiating instruction in Belizean primary classrooms, and this approach alone misses types of support that can enhance learning such as systematic instruction, visual supports, positive reinforcement, and consideration of individual preferences (Browder et al., 2014). The inclusive model emphasizes the transformation of mainstream learning as non-SEND students are involved in tutoring and mentoring SEND students. Inclusion in Belize has dramatically transformed Belizean primary classrooms as SEND students have not historically been integrated into mainstream classrooms. However, system-wide attention is needed to address the needs of all students to support their learning needs in inclusive classrooms.

Concerning special education, Hornsby’s (2015) theory suggests that what is missing in these classrooms is the provision of mastery learning and coordinated individual education plans for these students. While diagnostic testing is often available, educational goals have not been established for students. Therefore, teachers express an understanding of student ability when they enter the classroom based on MOE literacy assessment, but they do not express an understanding of targeted goals for students. Also, when teachers are required to implement strategies based on their perceptions of student learning needs, they miss the opportunity for collaborative assessment and planning. This missed opportunity includes missing the inclusion of parents in planning and goal setting for their children and providing a structure for family engagement. Adding a special education emphasis to inclusive classrooms in Belize may enhance efforts for school-family partnerships through the establishment of individualized education plans, a widespread practice in special education programs. Although teachers in these classrooms are differentiating instruction and assessments in line with special education efforts, there is little evidence that the differentiation is consistent across schools, grade levels, or between teachers as students progress from one standard (grade level) to the next. According to Hornby (2015), adding a special education component could enhance student learning as individualization and standardization of instruction, expectations, and assessment occur not only between teachers but also across grade levels and in communication with families. Additionally, adding a special education component could support teacher desire for additional training and support to meet the needs of this diverse group of students.

**Theoretical Implications**

The use of Hornby’s (2015) theory of inclusive education in this study provided an international application of this theory. Additional implications include applying the theory to findings in both rural and urban districts in the international context of Belize. Specifically, in this study, Hornby’s theory helped explain (a) how inclusion was practiced in Belize as teachers implement practices to meet the needs of SEND, (b) the challenges teachers experienced meeting the needs of these students, (c) and how family-school-community engagement was utilized in these inclusive classrooms to meet the needs of SEND. This explanation further validates Hornby’s integrated approach, (i.e., his integration of both understandings of inclusive education and special education) for serving students with special needs. This study adds to the existing body of literature on Belizean education and provides a significant platform for research-based practice as MOE officials become informed of challenges and opportunities experienced by classroom teachers.
Practical Implications

Interpreting findings through the lens of Hornby’s (2015) theory of inclusive special education adds a further dimension to existing practices in Belize on how teachers adapt to changing roles and expectations in their classrooms. Belize’s MOE is charged with ensuring that all Belizeans are given an opportunity to achieve the best education possible for their citizens. However, limited opportunities for professional training with an inclusive education emphasis may have impeded progress in reaching educational goals. Discovering how primary teachers are differentiating instruction in their classrooms can provide insight into how teachers address the challenges that are placed in front of them (with or without training).

Participants indicated the need for pertinent, ongoing, and sustainable professional development for all educators in local and national systems. This professional development should incorporate problem-based learning and hands-on strategies directly applicable to their contexts, and these practices should include opportunities for intra- and inter-networking and collaboration. For example, this networked professional learning can be seen in the practices associated with Project ECHO Education. Harris et al. (2020) explained the origins and specifics of the Project ECHO platform and its value during the pandemic. This type of professional development is a tele-mentoring practice that links expert specialists via Zoom technology with educational practitioners in local communities referred to as spoke sites. The process maximizes available technologies to leverage scarce resources, disseminates best practices to democratize knowledge, uses case-based learning to master complexity, and develops a web-based database to monitor outcomes and curate digital archives and resource materials (Harris et al., 2020).

Limitations and Future Research

Several limitations exist in this study. The overall sample size was adequate (N = 88); however without an equal representation of urban and rural teachers in the sample. This limitation should be taken into consideration when analyzing the findings. Additionally, interviews were conducted on Zoom due to travel restrictions associated with the pandemic. Classroom observations were also conducted virtually. Limitations also include the fact that the survey was utilized to identify a pool of applicants for the interview portion of the study. The participants who completed the survey were likely some of the most efficacious or engaged teachers in Belizean primary schools. It is unknown how this sampling procedure influenced the findings of the study. Implications for future research include expanding the work to better understand teacher practices in rural schools. Findings included a need for professional development in technology. Future research is needed to understand how to provide much-needed professional development to teachers across Belize to address the needs of students with SEND, particularly regarding the use and availability of technology to support student learning.

References


