

ENGAGING THE VISUALLY IMPAIRED STUDENTS TO LITERACY THROUGH ADAPTED GAMES

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Abstract: *Learning a foreign language for the visually impaired children with learning disability can be a stressful task. In this case, there is a need to create a learning atmosphere that decreases anxiety and captures the interest of the students. This is where the importance of integrating games in our language lessons comes in. There have been scholars in the field of language who contended that games are beneficial for language learners. These contentions inspired me to use adapted games to teach reading to five visually impaired students with learning disability. These students can recite and write the English alphabet in Braille (for the Braille readers) and in large print (for the Low Vision student). However, they cannot decode the written words or blend the sound-spelling patterns. Another factor that needs to be addressed is their short attention span and poor retention ability. To teach English Phonics and at the same time address these problems, I adapted games to deliver the lessons. These adapted games are played using materials with large print and Braille to cater to the needs of both the large print readers and the Braille readers. Subjects like Math and Science were also integrated in the lesson depending on the concept of the game. At the end of the school year, these five visually impaired students with learning disability were able to read short sentences and words with blended letters. They were also able to write simple words by listening to dictation. The use of adapted games as the heart of implementing the lessons and recognizing the element of play as essential in learning advances the literacy of visually impaired students with learning disability. This paper does not only explore on the academic benefits of adapted games but also on the emotional and social benefits that the students gain out of their educational experiences through games.*

Keywords: adapted games, language literacy for visually impaired, reading Braille

INTRODUCTION

Literacy liberates people from unpleasant social conditions such as poverty and dependence. The lack of it is strongly associated with poverty (UNESCO, 2006). According to EFA (Education for All) Global Monitoring Report (2006), literacy is at the core of education and especially Education for All with its focus on basic education. There are various definitions of literacy. Literacy as defined by the Thai Office of the National Statistics Bureau (2000, 2002) refers to the abilities in reading and writing simple words and statements in any language of people aged 5 and above. If one can only read but cannot write, he/she cannot be classified as literate.

Reading and writing are not only for people who can access print. The visually impaired who are considered as print-disabled can also access literacy through Braille. However, they don't learn in a typical way. The visually impaired students need exposure and experiences that are more planned for a specific purpose. For visually impaired children learning can be complex due to their visual limitations. Learning can be more challenging for children with visual impairment with other disabilities. Failure to address these challenges can lead to anxiety and absence of motivation among these visually impaired learners. The challenge is not only faced by the students but also by the teachers.

This is the same challenge that the 5 students of Khon Kaen School for the Blind were

facing. These students have the ability to recognize the tactile form of the alphabet and can write them. However, they were not equipped to read the simplest letter combination or blend the sound-spelling patterns. It is also important to note that these visually impaired students have also learning disabilities. Based on their record and the assessment I made, they have poor retention ability and limited attention-span that slows down learning. The self-esteem of students with these conditions can be affected and their avoidance of failure may lead to avoidance of activities associated with their failure (Westwood, 2015). This avoidance of failure impedes practice which delays progress in learning. This can further result to students becoming anxious and demotivated to learn.

To address these problems, I decided to integrate the concept of game-based learning in deliver the lessons. Games if designed according to what frames the motivation of the learners can allow graceful failure (Plass, J. et al, 2015). Games encourage risk-taking and exploration (Hoffman & Nadelson, 2010). In adapting and designing the game I considered the core elements of games design such as challenge, curiosity and fantasy that can create intrinsic motivation among learners (Dondlinger, 2007).

It is the objective of this study to engage the visually impaired students with learning disabilities to literacy through adapted games as the heart of learning, integration of jazz chants and learning routines. It aims to replace negative behavior with motivation and sustained engagement in learning. As educators we have the most influential role in the language learning of our students especially when English is not used in the community outside our class. We are not only responsible for content transmission but also in ensuring that our students get character education. Therefore, it is also the objective of using these strategies to enhance the students emotional and social skills.

Assessment: To ensure that the lessons are tailored according to the needs of the students, an assessment was conducted. The first thing I did was to interview my students' previous teachers. I observed the students to validate the responses I gathered from their previous teachers. One of them has attention deficit, 2 of them have mild autism and the other 2 have behavioral problems. All of these students have problems with attention-span and retention. I also observed and asked the students about their interests. Taking their interests into account is essential in making the activities fun and engaging.

Second, the degree of the students' visual impairment was assessed. Three of them are totally blind and 2 of them are Low Vision (LV) students. The Low Vision students were assessed on how much they can perform the tasks using their residual vision.

Assessing the degree of the student's visual impairment also contributes to the assessment of learning media that the students need. Of the five visually impaired students, four of them are Braille readers including one LV student. This LV student who can read Braille can also read print but it is a tedious task for her due to her limited visual capacity to access print. Among the five students, only one LV student can access print materials. Print-size assessment was needed for the LV student.

Assessing what learning media do the students need is very important in making decisions about choosing the instructional materials to use in the class. The last thing that was assessed was the student's reading and writing skills in English. All of them are familiar of the English alphabet. They can recite and write the alphabet. However, they cannot read the words or the vowel-consonant combinations.

Preparing Lesson Plans Based on Alpha Phonics: I adapted the lessons from the book and create a game out of it. Methods of teaching reading includes blending sounds through vowel-consonant combinations (e.g. "am", "an"). Then initial consonants were added to the vowel-consonant combinations (e.g. "ham", "Dan"). This makes reading easier for beginners. The words were also taught in families. (e.g. fan, ran, man). To make the words interesting, I choose the words that the students can easily relate to.

Instructional Materials: The instructional materials used were based on the game created for each lesson. The materials cater to the needs of both the Braille and large-print readers. Objects like cups for example has large print and Braille at the same time so that any students in the class can use the same set of cups to play the game. I also used Braille text in sheets to introduce the content of the lesson before the game or at the end of the game to reinforce what they have learned during the game. The atmosphere that the game-based learning approach created in our class is in contrary to the traditional way of teaching that is heavily biased on textbook learning.

Adaptive Games as the Heart of Delivering the Lessons

The following are some examples of the games adapted in our class:

The Cup Game: The cups were labelled with letters both in Braille and large-print on its base. I gave the letter combinations and the students had to form them using the cups. Then they had to read it aloud. I also reversed this by saying the word and asking them to spell it using the cups before they proceed to writing it.

Fishing Game: Fish cutouts with words both in Braille and large-print were used in this game. We used some metal paper clips and magnet baits. This was used to teach word families. The students had to catch the fish from the basin, read the words and decide which word family do they belong.

Shape O-Board: This is adapted from the famous Shape O-Toy. We used plastic boards and cut the basic shapes (circle, triangle, square and rectangle) from the boards. The shapes on the board and the shapes cut from the board were labelled with words both in Braille and large print. The students were asked to read the words from board cutout and match them with the words and shape on the board.

Integration of Jazz Chants and Routines: The use of jazz chants is ideal in teaching students in their early years of language acquisition. One of my visually impaired students' interests is music. Jazz chants really make them motivated. The jazz chants that were incorporated in the lesson were topic jazz chants. I composed jazz chants with stories using words from the lesson. Routines were integrated through the Station Game. In each station, the visually impaired students had to accomplish a task before moving to the next station.

RESULTS

Adapted Games had significantly produced great academic achievements among my visually impaired students. The five visually impaired students with learning disability were able to read short sentences and words with blended letters at the end of the school year. Their retention ability was also improved. They can remember the words they read and the vocabulary involved in the games. They even used it outside the class whenever they see things that they can associate with what they learned during our class.

I have also observed that the curiosity of the students when given the materials needed in the game engaged them in learning and their excitement to play the game sustains their level of engagement. They became more motivated through the

interactive experience they have through games. They get excited to read and decoding words became a game-like experience for them.

Their sense of achievement whenever they accomplish the task of the game increased their level of confidence. They are not afraid to commit mistakes because they know that they can try another strategy until they accomplish the task that a particular game requires. This reduced their level of fear to fail because they know that they can always try again.

The students' social skills were also enhanced by playing games in the class. They became more sensitive to the needs of others. They help their classmate who struggles to complete the task or they cheer for each other while playing the game. The students' educational experience provided by games prepares them to the next level of learning that requires higher skills.

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