Using the Branching Story Approach to Motivate Students' Interest in Reading[1]

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Abstract

This action research was to answer the pedagogical question: How effective can a branching story approach be as a motivational tool for elementary reading instruction? A branching story was created with hyperlinks built into a Powerpoint story. The young readers could interact with options at different turning points of the story, which activated the readers' curiosity, and promoted their decision making and thinking skills. The study was carried out in an all girl school, Saudi Arabia. A class of 20 fourth-graders participated in the study. For data collection and analyses, the students were assigned into four groups based on their previous reading achievements and interests. Students' responses to comprehension questions were tabulated. The unit-end survey results were analyzed. A majority of the participating students overwhelmingly enjoyed the experience. They were motivated to achieve the project goals sooner than planned. Kinesthetic learners demonstrated their academic potentials well beyond their performance under the traditional reading instruction.

Keywords: Branching Story, Narrative Reading, Multimedia Technology, Reading Instruction

Introduction

Reading Instruction

Reading contributes to improvement of individuals' minds and expansion of human beings' imagination. People are travelling far away in their minds during their reading activities (Sofsian, 2006). Reading improves vocabulary and the readers' power of word. Learning how to read at an early age helps with a higher level of intelligence and greater academic achievements as well as emotional development (Ciampa, 2012; Edgington, 1998; Sofsian, 2006). Young readers have more self-confidence than the nonreaders (International Reading Association (IRA), 2012; National Association for

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the Education of Young Children (NAEYC), 2009). Students' reading achievements correlate with the time they spent in reading activities (Gambrell, 2011; Swartz & Hendricks, 2000). Therefore, all children must have the needed time and opportunities to practice reading.

Moss and Terrell (2012) said that independent reading is an essential element of quality reading programs. Independent reading offers students a good opportunity to practice their reading skills. However, reading independently does not begin as an independent effort. It is a collaborative effort among students, educators and also parents (Sofsian, 2006).

IRA and NAEYC (2012) confirmed that effective teachers depend on their reading knowledge, current studies, appropriate expectations and understanding of children's strengths and needs to build their instructional strategies. They create developmentally appropriate goals and then find the appropriate instructions to achieve the goals. The developmentally appropriate instruction should be challenging, but achievable. The practice focuses on students' overall development in all domains of cognition, emotion, language, morale, and kinesthesis skills (Abu-Jaber, Al-Shawareb, & Gheith, 2010). This instruction includes daily dependent and independent reading experiences with stories and informational books.

Narrative Reading

There are many kinds of reading, including historical, scientific and narrative reading. Narrative reading is one of the most attractive and effective reading activities (Blyer & Perkins, 1999). Narrative is defined as a form of spoken or written communication, which tells a story. The word, narrative, comes from the Latin word *genarare* meaning 'to know' (Nathanson, 2006). Willingham (2004) believed that narratives have a privileged status in the learning process. Human minds deal with narratives in a different way compared with other types of reading discourse.

There are four fundamental advantages about narratives. They can be used to encourage everyone to love reading. Children prefer narratives (fiction) to non-fiction books. Secondly, narratives are easy to comprehend because there is repetition of names, phrases and vocabulary. Reading stories is generally a quicker experience than non-fiction reading (Nathanson, 2006). Thirdly, narratives build a story structure that facilitates making connection. Narratives should be viewed as an intrinsically teleological form, in which events can be explained by the prior events. Narrative stories are a chain of events that lead to conflicts and complications (Cronon, 1992). In addition, narratives can be facilitated through on-line processing and inference-making.

Moreover, narratives are persuasive tools that impact values and morals that may help to change the beliefs and ideas of individuals toward the world (Mar, Djikic, & Oatley, 2008). Fictional narratives may reinforce moral development and improve empathy. Reading narratives can influence one's character. The stories create shared meaning, beliefs, and visions that readers can associate with (Hakemulder, 2001; Kelly & Zak, 1999). According to Kelly and Zak (1999), narratives enable readers to dive into the story world, make readers part of the story world.

Narratives in Islam are equally valued in its education. The narratives are about human or nonhuman creatures that demonstrate representative good or bad behaviors (Yusef, 2011). The role of the creatures is to cultivate among people morally sound behaviors and avoid immoral ones. Aljefri (2008) argued that the Islamic narratives are used for religious, intellectual, behavioral, and social skills' development. The narratives represent truth of divinity, universe, human beings and lives, instill values, as well as teach how to construct a better society. They also carry as in any literature of

other cultures the elements of stories, such as plots, setting, events, and characters to achieve educational goals. Because of the human needs to create meaning and make connections between knowledge and experiences, narratives are part of human traditions in all cultures. They help to protect the culture by telling, retelling and exploiting a culture's heroes against the threat of their enemies (Kelly & Zak, 1999). Therefore, this literacy mode is popularly used in all countries and cultures.

Motivation to Read

Reading is considered as the first duty that Prophet Mohammad had received from Allah through the angel Gabriel. In Muslim culture, people, old and young, are expected to read the Qur'an as well as other books so that people may live a fuller life. With so many advantages of reading and obligation to become literate citizens, people are not necessarily interested in reading. Some Muslims today are not voluntary readers, that is, they do not have the desire to read different books. UNESCO (cited in Alaga, n.d) recently reported that Arab countries have the highest percentage of illiteracy in the world. Reading activity is one of the least interesting hobbies for quite a number of people in the Arab world. A study of 80 Arab people (Afifi, 2012) indicated that the participants only read one book a year. An individual in the Arab countries spends an average of only 6 minutes in reading (outside the Qur'an) per year while individuals in European countries and America read for an average of 200 hours a year. While 35,000 books are published in America and 85,000 books in Japan a year, only 5,000 books are published every year in the Arabic world. Obviously, lack of reading resources and little motivation to read are problems in the Arab countries, including in Saudi Arabia.

Gambrell (2011a) described motivation to read as "the likelihood of engaging in reading or choosing to read" (p. 5). People with high motivation to read find time to read, consequentially improve their reading skills. Social Cognitive Theory can help explain the reason for lack of motivation (Gambrell, 2011a). Learners do not imitate their teachers thoughtlessly. They need to cognitively realize the importance of reading while they follow the teacher's modeling. It asserts the role of self-efficacy in learning. Motivated readers read more than unmotivated readers, achieved higher levels in their reading classes, performed better on standardized tests of reading and had higher school grades (Applegate, 2011; Gambrell, 2011). Deci and Ryan (as cited in Ciampa, 2012) believed that motivation is critical to engage young students in the reading process. It is also a clear predictor of the students' future skills in reading. Students' motivation appears in their thoughts about themselves as readers and their opinion about the reading process (Ciampa, 2012). The most important reason for high motivation to read is that the more one reads, the better readers he/she becomes (Gambrell, 2011a). Lai (2013) found many useful ways to improve students' reading skills; however, students are not able to benefit from these ways unless they have the drive to read. Teachers at elementary schools are viewed as the most influential in students' motivation to read than the teachers after elementary schools (Ulper, 2011).

A powerful strategy for motivation is to offer opportunities for students to choose what and how to read. Retting and Hendricks (2000) asserted that choice is a strong force that urges students to become autonomous for their own learning. When students are given the chance to choose their reading assignments, they are more intrinsically motivated and have better performance (Ciampa, 2012).

Using Technology for Reading Activities

Over the past decade, with technological advancement, Saudis are becoming the biggest buyers in the world of technology (Alzubedi, 2012). Although Saudi Arabia has the fewest readers in the Arab world, Saudies are the best readers in fast reading by

using the new technology tools (Alhasan, 2010). The strong economic conditions in Saudi Arabia enable the Saudi people to use these devices easily. People are interested in multimedia tools. They prefer to use technological tools like smartphones for fast reading through social networks. This technology revolution in Saudi Arabia is affecting the youth's learning style, too. Conventional language learning methods are being challenged since this technology-savvy generation of students grows up with the 21st century technologies. There was no explicit data by far about time Saudi K-12 students spend with technology tools, but it was reported that American youth spent between 6 and 8 hours daily using technology tools (Petkove & Rogers, 2011). This generation of children considers e-book as "a new and unique medium" and many of them prefer digital reading to the conventional books (Ciampa, 2012; Reinking & Watkins, 2000). Innovative educators are using digital stories as an alternate tool to serve a powerful role of reviving language learning and culture as well (Rivera & Reuney, 2010).

Digital stories usually contain some multi-media features, such as videos, sounds, graphics, animations as well as choices for readers to practice their problem solving skills. All the features jointly form into a strong motivational force that attracts students to be responsible for their own learning and improve their self-independence (Austen, 2001; Oakly & Jay, 2008; Ciampa, 2012; Swartz & Hendricks, 2000).

Among digital stories, a branching story is structured with its unique features. Branching stories are narratives. They have different paths that encourage the reader to interact with the plot. It contains "directed graph of nodes connected by arcs that represent user choices. Every possible path through the graph represents a story that can be told to the user" (Riedl & Young, 2006, p. 26). The choices in a branching story engage readers into making a decision among the options and looking forward to the next event of the story. Branching stories can be compiled into different genres, such as fantasy, adventure, and even video games. They can be used for the purposes of entertainment as well as instructional practice (Lai, 2013).

There are many technological tools to create branching stories. One of the easiest and most common tools is Microsoft PowerPoint. Jones (2003) described PowerPoint as a presentation program, which was initially used widely in the business world, and then eventually brought into educational field. If used effectively, PowerPoint can (a) promote teaching and learning process for both students and teachers, (b) encourage teachers to facilitate their instruction in a professional matter, and (c) distribute the electronic file for and to students where the viewer of PowerPoint is free (Jones, 2003; Nouri & Shahid, 2005). The program can be a powerful motivational medium.

Purpose of the Project

The purpose of this study was to examine how branching stories could effect students' motivation to read. Most people in Saudi Arabia do not have the desire to read beyond their religious obligations. The problem starts during their childhood when they are not encouraged to read. The notion of reading is related to the notion of studying. This generation of technology-dependent students enjoy reading using technological tools. Therefore, a computer-based branching story was created in an effort to enhance students' intrinsic motivation in reading.

Research Design

This project went through several major preparatory stages: designing a branching story and related reading activities, obtaining approval from the university Institutional Research Board and also from Ministry of Education in Saudi Arabia, and then choosing a school that accepted this experiment.

Branching Story Design

In the process of designing a branching story, identification of its reader was the first to consider. All schools in Saudi Arabia are gender segregated, so the researchers knew that the study would be carried out in an all-girl school. Fourth or fifth graders were the target readers because they should have possessed the skill in independent reading and an ability to answer comprehension questions with evidence to support their answers. Thus a narrative branching story was planned to design for forth and/or fifth grade female students. In order to ensure that the story was developmentally appropriate, the native Saudi researcher first explored Saudi young girls' interest in stories they had read. Almost all Saudi female elementary children asked mentioned Cinderella as their favorite.

As a result, a branching story was generated, titled as "Cinderella Wants a Child", using a popular character from a popular fairy tale. The story starts where Cinderella's original version ends. It unfolds after Cinderella's happy marriage to the Prince. Cinderella has difficulty in getting pregnant. She faces the pressure of either being divorced from the royal family due to no help with the Western medicine, or going to the top of a far-away mountain to secure a magic herb. The story is not just for fun, but also to teach children moral lessons of love, bravery, and perseverance.

The branching story was structured as a narrative mediation tree (Figure 1). It includes 44 slides in total with graphics and scripts on each slide. Hyperlinks are built into 40% of the slides that take the readers to eight different paths and/or twists of the story. The eight paths loop and are intertwined. Two buttons are provided on each of 18 slides. Students can choose to click on either button and then be taken to the chosen path of the story development. A path contains between six and sixteen slides. The language on each slide is formal in order to improve students' vocabulary. Options are offered to maintain student's interest, but not provided on each slide because the purpose of this project was to promote students' desire in reading instead of playing a game.

The script was written in both Islam and English. The words on each slide varied in length in order to improve students' reading skills and avoid students' fatigue with continuous reading of the lengthy text. PowerPoint Presentation program was used to carry through the story. Pink color was chosen as a background because the Saudi girls who were inquired about their favorable figure associated Cinderella with the color of pink. Black was the chosen font color for sharp visionary contrast. Pictures and images were integrated to the slides to maintain young readers' interest and to promote their imagination. The feature of "rehearse time" was also built into each slide. This enables educators or researchers to record the time length during which a reader stays on each slide.
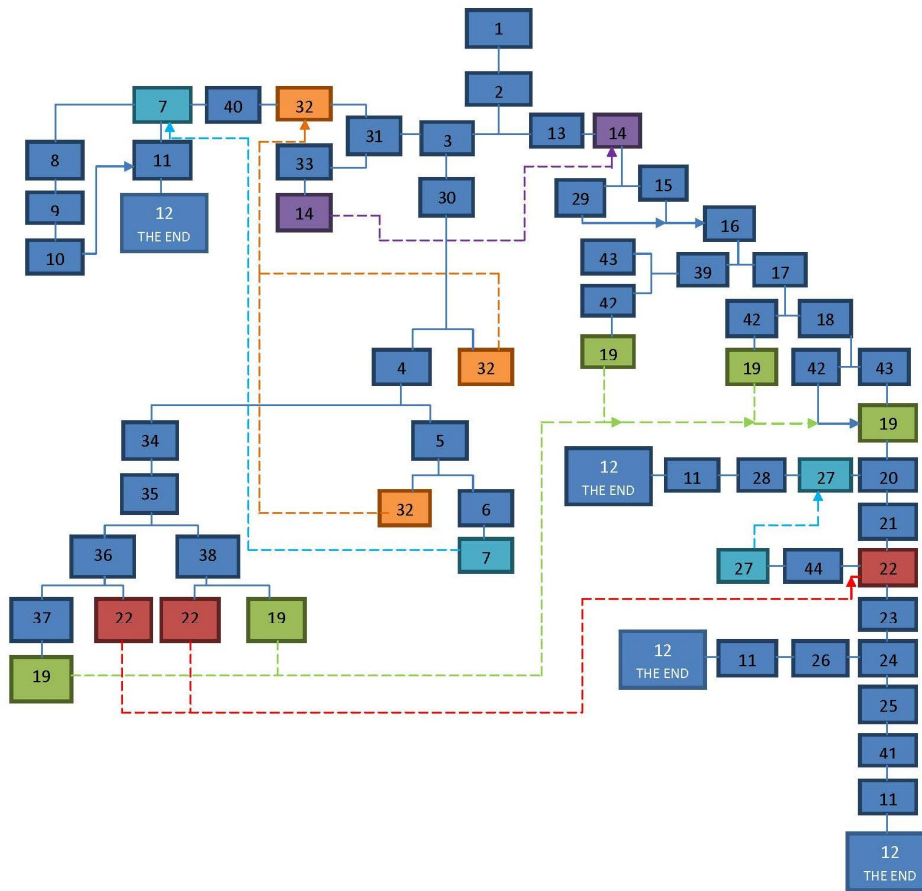
Figure 1. *Narrative Mediation Tree*

Project Activities

This branching story approach included four components for students to perform: 1) understanding of computer rules, 2) independent reading time of the branching story, 3) individual time to answer the comprehension questions on the worksheet, and 4) whole class sharing time.

The rules students should understand and comply with during independent reading time were:

- Do not start the activity without the teacher's permission.
- Choose only one option from the two provided.
- Do not go back to the previous slide after clicking the button.
- Use only computer mouse, not the keyboard.
- Stop reading at the end of the scheduled reading time.
- Do not use the computer while they answer the comprehension questions.
- Start reading on the second, third, and fourth day from where they stopped the day before.
- Tell the teacher when they reach the end of the branching story.

Comprehension is an essential component of the branching story approach. Ten comprehension questions were developed for students to answer after reading the story. The questions covered all levels of cognitive development. The knowledge-level questions were: What is Cinderella doing? What did Cinderella see? The prediction questions included: What do you think she would do? What do you think would happen to Cinderella next? What is your prediction of the story? And synthesis questions are: How would Cinderella find the treatment for her pregnancy? Why do you like Cinderella and some other figure(s) in the story? The last section of the whole class discussion was scheduled to provide students the opportunity to orally communicate their understanding of the story.

Participants

Twenty fourth-grade females were the participants. Complying with the research policies of the American university and the Ministry of Education in Saudi Arabia, the native Saudi researcher first needed to choose a participating school out of the Ministry's approval list. Because all schools in Saudi Arabia are gender segregated and the native Saudi researcher is a female, the school chosen had to be an all-girl elementary school. Furthermore, the researcher needed to ensure that the school should have enough computers for each participating student. As a result, a private school with a well-equipped computer lab was chosen. The principal there embraced this innovative study warmly. She made the decision on the participating teacher and her entire intact class because the teacher was viewed as a strong reader herself and a professional with a sincere interest in reading strategies.

The fourth graders between the ages of nine and ten in the entire class were all involved in the experiment. The students were divided into four groups based on their previously demonstrated interest in reading and reading achievements: four high readers (H 1-4), seven average readers (A 1-7), five low readers (L 1-5), and four highly active students (HA 1-4) with low academic performance.

Project Implementation

The entire study was planned for five days. The Islam version of the story was used. The native Saudi researcher performed as activity facilitator and observer. The teacher maintained to be the direct communicator with her students. The activity started at the beginning of the week, Saturday and continued on Sunday, and other days of the week. Thursdays and Fridays are weekends in Saudi Arabia. The activity lasted for 45 minutes on the first day and 40 minutes for the remaining days.

On each of the days, all the fourth graders transited from their classroom to the school computer lab after the regular school day. They each took their assigned seat in front of a computer that had a cover page of the branching story on the screen. On the first day, the teacher started by asking the students about the story of Cinderella, then informing them that the activity would let them know more about Cinderella after her happy marriage. The teacher explained the rules and procedures of the branching story approach, and then the students started independent exploration and reading of the story.

At the beginning, the students were very eager to start the process. Several of them watched their classmates for the first few minutes, and then got into the discourse themselves. A few just clicked on the option buttons to satisfy their curiosity of this new practice. The students all knew quite well how to use a computer, and did not have much difficulty with computer operation. Most of the questions they asked were related with what to do with the options. It was interesting enough to notice that the questions mainly related to what was "right" to do, such as "What is the correct button?" "Should I

click on this button instead of that?" "Is this a correct option?" Some students repeatedly asked the similar questions. They seemed to have a hard time in realizing that they were given options and autonomy to choose.

With the days progressing, more students looked more interested and engaged in the activity. They asked to come to the computer lab earlier. They quickly got into the quiet reading time after entering the lab. There was less informal chatting between the students during the reading time. They were so attentive to reading with their bodies leaning closely toward the computer screens. More students were willing to share their answers to the comprehension questions in written and orally. They were excited to tell about what they had read.

On the fourth day, students came to the computer lab and started immediately working on the story. It was apparent that a majority of the students accomplished the story and answered the comprehension questions well on the day. The researcher and the teacher decided to end the study one day earlier. However, it was encouraging to observe the few students who did not finish the entire story continue reading because they were still eager to know the ending of the story.

Data Report

The empirical data was collected. The researcher took anecdotal notes while observing the students. "Rehearse Time" was saved daily and recorded on the computers each day after students left the computer lab. The students answered the comprehension questions, demonstrating their understanding of the narrative they had read that day and predicted what would happen next. The whole class sharing time turned out to be a pleasant interactive opportunity for verbal story telling. The students completed the unit-end survey to express their opinions about this reading event.

Table 1. *Data report on student's reading time.* (Time was recorded in seconds.)

Slides / Students	Slide 2 64 words with options	Slide 12 43 words no options	Slide 4 70 words with options	Slide 27 83 words no options	Slide 20 28 words with options	Slide 33 5 words without options
H1	49 s	35 s	6	25	11 s	10
H2	51 s	35 s	50	92	25 s	46
H3	19 s	41 s	0 read	64	15 s	9
H4	45 s	55 s	24	0	32 s	
A1	58 s	24 s	0	16	7 s	8
A2	58 s	24 s	19	24	10 s	16
A3	52 s	39 s	0	51	12 s	35
A4	12 s	32 s	41	26	10 s	9
*A6	28 s	23 s	19	9	18 s	28
A7	17 s	24 s	26	41	15 s	0
L1	76 s	107 s	0	75	41 s	0
L2	139 s	31 s	0	75	42 s	27

Table 1 (Cont.). *Data report on student's reading time.* (Time was recorded in seconds.)

Slides / Students	Slide 2 / 64 words	Slide 12 / 43 words	Slide 4 / 70 words	Slide 27 / 83 words	Slide 20 / 28 words	Slide 33 / 5 words without
L3	10 s	80 s	49	0	11 s	0
L4	30 s	12 s	32	83	11 s	0
L5	80 s	55 s	121 s	60	33 s	40
HA1	16 s	42 s	0	52	5 s	8
HA2	63 s	78 s	126 s	24	36 s	38
HA3	21 s	3	7	14	4 s	6
HA4	8	28 s	19	4	21 s	15

* A5 was absent for two days. So her record was not included.

The feature of PowerPoint "rehearse time" enabled the researchers to track how long a student spent on each slide. This feature showed progression of students' reading time. It helped the researcher be aware of each student's reading capacity. Table 1 tabulated the time the students spent in reading six selected slides. Slide 27 has the most words of 83 and Slide 33 contains only five words.

Students' reading time for those six slides can be divided into three different levels: long, average and short. The long time used would inform a teacher that a particular student might have difficulty in reading and/or comprehension when her answers to the comprehension questions were not an accurate summary of the narrative. The average time used could imply the time length a teacher should schedule for later. The short time used may lead to two possibilities that the student either did not read or a fast reader. Their comprehension answers could be associated as an indicator of either possibility.

Four students (two HAs, one A, one L) took longer than 60 seconds for reading Slide 2, beginning of the branching story. Six students (one H, two A, one L, two HAs) spent shorter than 20 seconds. The remaining students spent between 30-50 seconds to read slide. Three students (two Ls, one HA) spent more than 70 seconds to read Slide 12, which concluded the branching story. Two students (one L, one HA) spent shorter than 13 seconds on it. Majority of the students spent 20-50 seconds to read it. For reading Slide 4, two students (one L, two HAs) spent more than 120 seconds reading the slide. Five students (one H, two As, two HAs) took shorter than 20 seconds. The remaining students took from 20 to 50 seconds to read it.

Two L students spent longer than 40 seconds to read 28 words in Slide 20, which had two options. Three students (one A, two HAs) spent shorter than 8 seconds to read Slide 20. The remaining students used 13-30 seconds to finish reading the slide.

Four students (one H, three Ls) took more than 70 seconds to read Slide 27, which included 83 words with no options. Four students (two A, two HAs) spent shorter than 20 seconds. It took the remaining students 30-60 seconds to read this slide.

For reading Slide 33, which included 5 words with no options, four students (one H, one A, one L, one HA) spent more than 35 seconds. Four students (one A, one L, two HAs) spent shorter than 8 seconds. The remaining students spent the time between 10-30 seconds.

Examining the students' reading time of the six chosen slides, it was conclusive that more low students (L) and one highly active student (HA) needed a longer time to read the slides. The feature of "Rehearse Time" apparently tracked the time when a student stayed on each slide, but the researchers are cognizant that it entails more practice of this feature in the future to generate appropriate time length during which a student needs to read each of the scripts. The time gap between the students can imply multiple aspects of instruction regarding students' reading ability, attention span and interest in reading, etc.

Table 2 recorded the number of words and sentences the students put in their answers to the comprehension questions. Some questions required descriptive responses, such as what was Cinderella doing in order to get to the mountain? Or why do you think Cinderella would find the treatment? Students' answers were used to inform the researchers of their comprehension level of the branching story. Students from different groups demonstrated different levels of understanding. Students' responses to the comprehension answers without description were categorized as generic answers. A large number of words and descriptive sentences used in the answers belonged to the high level of comprehension.

Table 2. _Students' Answers to Comprehension Questions_

Student	Number of Words	Number of Sentences	Descriptive Answers	Generic Answers
H1	41	5	2	8
H2	41	8	4	6
H3	37	6	3	7
H4	40	4	3	5
A1	32	6	3	7
A2	74	9	7	1
A3	17	4	1	9
A4	36	7	2	8
A5	40	7	2	8
A6	71	12	6	4
L1	16	3	2	5
L2	4	1	1	6
L3	30	4	4	1
L4	25	6	4	3
L5	43	9	4	6
HA1	61	9	3	7
HA2	63	10	8	2
HA3	57	9	6	4
HA4	74	9	5	5

All the four HA and two A students responded with rather long answers of more than 55 words. They each wrote more than 10 sentences. Their answers were more descriptive than other classmates. Two L (4 and 16 words used) should be categorized as "low" because they wrote the least number of words for the comprehension questions. Their answers were more generic than descriptive. The answers from the remaining ten students 4 Hs, 3 As, and 3 Ls were categorized as "average". The average number of words in their answers was 38 words. The number of descriptive answers was appropriately three sentences from each student.

To the teacher's greatest surprise, the HA students answered the comprehension questions with a larger number of descriptive sentences than their peers of any other groups did. They demonstrated their understanding of the story clearly. The recorded release time revealed that three of them spent a relatively short time in reading the story. The teacher assigned them as highly active learners due to her previous difficulty in keeping them engaged into an activity or maintaining their attention for a longer period of time in class. This study offered them an alternate opportunity to display their cognitive potentials. Their minds responded much better with the interactive kinesthetic activity. Once the learning approach matched their learning styles, they could focus and achieve a lot better.

Table 3 displayed students' responses on the unit-end survey. Seventeen students participated in the survey. Due to family activity, three students did not attend school that day. The data revealed that 90% of the students (15 out of 17) viewed highly their experience with the branching story approach. They also expressed their desire to read more stories like this. Fifteen students preferred reading on a computer to a printed book. Thirteen students liked to have the feature of options in the branching story.

Table 3. *Result of Unit-End Survey*

Survey Questions	Answers	4 High Students	6 Average Students	3 Low Students	4 Highly Active
How was your experience with the activity of the branching story?	Great	100% (4)	83.3% (5)	100% (3)	75% (3)
	Weak	0%	16.6% (1)	0%	25% (1)
Do you like the Cinderella story?	Yes	100% (4)	83.3% (5)	100% (3)	75% (3)
	No	0%	16.6% (1)	0%	25% (1)
Were the instructions of reading the branching story clear?	Yes	75% (3)	66.6% (4)	66.6% (2)	75% (3)
	Not too much	25% (1)	16.6% (1)	33.3% (1)	25% (1)
	No	0%	16.6% (1)	0%	0%
How were the questions about the story?	Easy	100% (4)	50% (3)	66.6% (2)	75% (3)
	Average	0%	50% (3)	33.3% (1)	25% (1)
Do you like the options of the story?	Yes	100% (4)	50% (3)	100% (3)	75% (3)
	Not too much	0%	50% (3)	0%	25% (1)

Table 3 (Cont.). *Result of Unit-End Survey*

Do you like to read a hypertext story or a printed book story?	Hypertext story	100% (4)	66.6% (4)	100% (3)	100% (4)
	Printed story	0%	16.6 (1)	0%	0%
Do you like to have the same activity with different stories?	Yes	100% (4)	66.6% (4)	100% (3)	100% (4)
	No	0%	33.3% (2)	0%	0%
Do you like the pictures in the story?	Yes	100% (4)	66.6% (4)	100% (3)	75% (3)
	Not too much	0%	16.6% (1)	0%	25% (1)
	No	0%	16.6% (1)	0%	0%

The whole class sharing time was the culminating point of the branching story approach. The students were unexpectedly active in sharing their interpretation of the story with the classmates. The students' participation level was much higher than in the conventional reading activities according to the teacher. Some students responded the comprehension questions with the vocabulary at a more advanced cognitive level than before. Interacting with the story, making their own options for different paths, and using narrative writing to express their own comprehension of the story activated the students' minds and offered the students the opportunities to display their academic potentials. Their positive attitude in the entire discourse and demonstrated engaging behaviors manifested the effect of technology integration in motivating students' passion for reading.

The most amazing changes occurred on the four students who were labeled as "highly active" because they had a hard time in focusing, which consequently affected their reading grades negatively with the traditional instructional practice. Their behaviors and performance levels with this branching story approach were astonishing. They were engaged into the activities without any behavior problems in all the four days. Three of them showed their best cognitive skills never before in writing and verbal sharing. Even the other HA student who spent a little longer time in reading the story also outperformed many other peers in her answers to the comprehension questions.

Discussions

In summary, this project accomplished its original goals: the branching story approach interested students and motivated them to read. The experience energized students' enthusiasm in reading. They were eager to read the varied plots of the story and volunteered to share their understanding of the story. They were passionate about informing their classmates about what they had read due to the different path they each chose on the different days. They felt empowered with the options, and gained satisfaction of learning more twists of the story, even if one day earlier than some of their classmates. The students' participation level exceeded their performance with the conventional reading activities.

The recorded "rehearse time" reflected the students' increased focus on reading. By the end of the event, the time the students spent on each slide became longer. They became more serious about reading and understanding the content with decreased causal chatting among the students while reading. This branching story design created opportunities for students' engagement, and the engaged students worked hard. The

students' attitudes, learning and performance improved with more active self-efficacy and motivation.

The results of this project once again reinforce the necessity to differentiate instruction to promote all students' interest in reading. Traditional methods have proved unsuccessful in getting all students involved into an effective learning, especially with this E-generation. The kinesthetic learners require hands-on experiences. Doing, touching and taking part in physical activities promote their success in learning (Hutton, 2007). Transformed instructional strategies can function to facilitate students' learning and bring their potentials into full play.

It is vital to point out that adoption of technology into reading instruction will not totally replace the traditional methods. It should be a part of the entire pedagogy. Teachers need to have knowledge and proficiency to employ all kinds of teaching strategies that it takes to meet all students' needs. Teachers need to consider students' cognitive and affective level as well as culture of the entire school's instructional practice. Using technology tools should be age appropriate and match students' skills and abilities.

Limitations of the Study

All educators should be gender sensitive, and not stereotyping. As an initial effort in applying the branching story approach into reading instruction, Cinderella was chosen as the main character and the color of pink as a background. However, the researchers realized that Saudi young female students should be exposed to more branching stories with broadened cultural and social perspectives.

Recommendations for Future Application

The positive effects of this branching story approach hold implication for the future efforts to integrate the branching story approach in a wider scope of Arabic reading instruction. Therefore, the following recommendations were made:

1) More branching stories should be developed for instructional purpose and also for fostering life-long readers. Stories/Narratives from the printed books can be transformed into multi-media branching format. Educators, storywriters, even students should be encouraged to design branching stories as much as possible.

2) It takes time and some expertise to design a branching story, especially narratives that developmentally appropriate. Thus teachers should work collaboratively to design stories instead of waiting for the stories to come to them.

3) In order to reach and motivate all kinds of learners, the need to integrate updated technology into the regular reading instruction is obvious. Branching stories are just one kind of technology. Internet and social media can also be used in reading instruction to provide students with different kinds of e-books. A new generation of Saudi students is awaiting more e-reading opportunities.

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