

A Mixed Method Study on Improving Reading Speed and Reading Comprehension Levels of Gifted Students

Taşkın Soysal*

Department of Turkish Education, Karamanoğlu Mehmetbey University, Turkey

Corresponding author: Taşkın Soysal, E-mail: taskinsoysal@gmail.com

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ABSTRACT

Gifted students have a reading capacity above their level. The aim of this study is to improve the reading speed and reading comprehension levels of gifted students through training in speed reading techniques. In the study, in which a total of 100 participants from the 4th, 5th and 6th grades attending the Science and Art Center took part, 28 hours of training in speed reading techniques were given to the students. The study was carried out according to a nested mixed methods design, which is one of the mixed research methods. While the quantitative data of the study were collected according to the pretest-posttest model without a control group, the qualitative data were obtained through semi-structured interviews with the students in the study. At the beginning of the study, the students' initial reading speeds were taken through a narrative and an informative text, and then these students were given 28 hours of speed reading techniques training. At the end of the studies, the students' post-reading speeds were taken and the difference between the pre-tests and the post-tests was compared using the SPSS 21 program. At the same time, semi-structured interviews were conducted with each student who took part in the study during the 28-hour training period, according to the planning made. In the studies carried out, it was concluded that the education in speed reading techniques increased the reading speed and reading comprehension levels of the gifted students, that the students developed a positive attitude towards reading and made an important step in gaining reading habits, and that the studies carried out would be beneficial in terms of increasing the academic success of the students.

Key words: Special ability, Gifted students, Reading speed, Speed reading, Reading comprehension

INTRODUCTION

It is possible to encounter different definitions of the terms special talent and giftedness in the literature. General talent is defined as “the accumulation that shows the knowledge and skills of the person in any field of science, technique, and art.” (TDK, Turkish Dictionary), while special talent is defined as “a combination of above-average talent, creative thinking, and sense of duty” (Renzulli, 1978). Evidence that a child is truly gifted can be understood through the specific skills he or she demonstrates because gifted students stand out in certain skills, unlike their peers. According to Renzulli (1986), special talent or special intelligence emerges as a result of the interaction of the following three basic components in the human structure:

1. Being above average in general intelligence development, having an above-normal ability (ability).
2. The ability to produce creative solutions by approaching problems from different angles (creativity).
3. Having a high motivation that can take a task from the beginning to the end (motivation).

In the “Science and Art Centers Directive”, which is concerned with the institution where most gifted children receive education starting from the second grade of primary

school, different from school education, gifted students are defined as “Those who learn faster than their peers; an individual who is ahead in creativity, art, leadership capacity, has special academic abilities, can understand abstract ideas, likes to act independently in his interests and performs at a high level” (Bilim ve Sanat Merkezleri Yönergesi, 2015). Keywords such as learning speed, creativity, artistic quality, leadership, academic success, metacognitive skills, and motivation come to the fore in the emphasis in the definition. Chandler and Ziegler (2017) and Walden (2014) stated that gifted individuals need more special education and a differentiated and enriched special education program compared to their peers. However, despite these strengths, gifted students do not have the opportunity to develop their own abilities, as they are expected to achieve the gains in normal education programs at schools. Support for gifted students often includes a mix of acceleration and enrichment of the regular curriculum (Schiever & Maker, 2003).

Gifted children have a level of development ahead of their peers in the areas in which they are gifted. In the education of gifted students, activities should be planned in a way that will improve their high-level thinking skills. In this way, they acquire the knowledge and skills in that field faster,

earlier and more than their peers and use them more effectively (Yörük, 2020). Science and Art Centers in Turkey are state institutions operating to meet the aforementioned needs of gifted students. "Students participate in project-oriented education activities in these institutions through training programs designed to improve their creativity and special abilities in the field" (Science and Art Centers Directive, 2015).

Gifted students who have above-average abilities, creative thinking skills, and sense of duty have a wide imagination. They do not have difficulty in forming concepts and establishing relationships between concepts, they think fluently, they memorize easily and they can keep what they have memorized in their memory permanently. These students, whose vocabulary is richer than that of their peers, love to read and mostly learn to read and write before school life starts (Çağlar, 1972; Oğurlu, 2014; Sak, 2011). Gifted students also have features such as reading more fluently and accurately, reading more, and liking reading from different literary genres compared to their peers (Akarsu, 2001; Davaslıgil & Leana, 2004). Considering that reading is one of the most important ways and perhaps the most important way of accessing information and constantly updating it (Karatay, 2010), it is clear how important each milestone that gifted students take in reading will be.

Studies (Bonds & Bonds, 1983; VanTassel-Baska, Johnson, Hughes, and Boyce, 1996) have determined that fifty percent of gifted students who start school life learn to read before they start school and that they do advanced reading at grades 1-3 compared to their peers. Reis et al. (2004) found that these students liked reading very much, enjoyed reading at a high level, learned to read earlier than their peers, had at least 2 years more advanced reading skills than their peers, and had high-level language skills and high-level reading comprehension skills. According to Anderson, Tollefson, and Gilbert (1985), reading in terms of gifted students is an easy, pleasant, relaxing, and enjoyable activity. Gifted students read more often than average in their readings in line with their own wishes, and they have the desire to read in various subjects and in different fields. These students also have 1 or 2 years of advanced reading interest maturity compared to their peers (Harris & Sipay, 1990 as cited in Cavazos-Kottke, 2006). In their study, Kara and Ünal (2019) stated that gifted students reflect well in their writing, which is one of the principles of text linguistics, especially in terms of vocabulary diversity and the use of stereotypes (idiom, reduplication, concise words); they also emphasized that this is an indication that they are good readers.

Special talents, who show higher features than their peers in reading, show high performance in creativity, intelligence, artistic approach, special academic fields or leadership capacity, and they need extraordinary education programs and services to fully develop these capacities (Hallayan & Kauffman, 1994). Speed reading, which is defined as "increasing the number of words read per minute and the level of comprehension compared to the previous reading time by improving the quickness, comprehension and memory skills of individuals" (Ruşen, 1995), is the whole of activities

carried out to meet this need of individuals. In speed reading activities, the focus is primarily on expanding the field of view of the eye and increasing the speed of perception of the mind. As a result of eye and brain coordination, words start to be perceived faster, and fast reading methods and techniques are started. People have the ability to read and understand faster after certain training.

The starting point of the study is that gifted students have a reading speed above their peers. From this point of view, it was investigated whether gifted students who received speed reading techniques training achieved better results than their peers who received this training before. Since the study was studied on speed reading techniques education with gifted students, it differs from previous studies on gifted students in the literature and it is thought that it will be a source for new studies to be made. The primary aim of this study is to determine the reading speed and comprehension levels of gifted students. In the second stage, the aim is to compare the reading speed and reading comprehension levels obtained by these students with training in speed reading techniques with the pre-test data and existing studies in the literature. Thus, an attempt has been made to determine whether the training in speed reading techniques given to students with special abilities differs compared to their peers, as well as the opinions of the gifted students towards this education after the training in speed reading techniques. Reading is an activity that can be developed and improved. Just as children learn to read and write through teaching, literate youth and adults can also develop these skills through education. By applying certain curricula, people can understand and read faster (Akçamete & Güneş, 1992). The problems and sub-problems to be answered in the research are as follows:

Objectives and Research Questions

What are the reading speeds and reading comprehension levels of gifted students?

The research questions are as follows:

1. Is there a significant difference between the pre-post-test reading speed of narrative and informative texts of gifted students?
2. Is there a significant difference between the reading comprehension levels of gifted students in the narrative and informative text pretest and post-test?
3. What are the opinions of gifted students on training in speed reading techniques?

METHOD

Research Pattern

This study, which was conducted to determine the reading speed and reading comprehension levels of gifted students, was designed according to a mixed research method in which quantitative and qualitative data were handled together (Creswell & Clark, 2011; Creswell, 2017). In the quantitative dimension of the study, a pretest-posttest experimental design without control group was used. The pre-test post-test quasi-experimental design without a control group is a type

of design in which the effect of the experimental procedure is examined through the pre-test and post-tests applied on the same groups before and after the experimental procedure (Büyüköztürk, 2007; Sönmez & Alacapınar, 2013).

The model of the research is presented in Table 1:

Q1: Pre-test score of the experimental group

X1: 28 hours of speed reading training

Q2: Post-test score of the experimental group

The data of the qualitative dimension of the research were collected by semi-structured interview method. The healthiest way to learn the feelings and thoughts of the participants about the speed reading activities applied in the research is the interview. According to Yıldırım and Şimşek (2008), the interview is important in terms of giving information about the inner world of the individual. It provides clues to the researcher about the reasons for the individual’s reaction to events and situations. Due to the collection of data through semi-structured interviews in the seven-week period from taking the pre-tests to taking the post-tests, this study falls into the group of nested mixed research methods. The nested mixed pattern involves the use of data either in a combined or sequential manner, but the main idea is; either quantitative or qualitative data have a supporting role on the whole of a larger data set (Bütün, 2017). The research procedure is presented in Figure 1.

Participants

The universe of the study is the gifted students attending Science and Art Centers. In order to attend Science and Art Centers in Turkey, it is necessary to pass certain tests in the 1st, 2nd or 3rd grades of primary education. In this sense, students who attend Science and Art Centers from the field of general talent have similar characteristics in terms of passing the said tests. The sample of the research consists of 100 students in the 4th, 5th and 6th grades attending a Science and Art Center in the Western Black Sea Region in the 2019-2020 academic year. The distribution of the students in the study according to the classes is as follows:

According to Table 2, a total of 100 students, 34 from the 4th grade, 33 from the 5th grade and 33 from the 6th grade, took part in the study as participants. These students are gifted students who have the right to attend the Science and Art Center outside of school because they have passed the special talent exams in addition to their normal education life.

Process

In the study, after the students were informed about the work to be done in the first week of the 28-hour period, a narrative and an informative text from Karaoğlu’s

(2019) book “Speed Reading with Understanding for Children” were read to the participants, so that the students’ first (pre-test) reading speed and the texts read were determined. Based on the answers they gave to the related questions, their reading comprehension levels were determined. The narrative and informative texts in question consist of one hundred and thirty words each, and there are five multiple-choice questions connected to each text.

Reading speed or silent reading speed is widely accepted as one of the indicators of reading fluency. It is generally known as the word recognition rate, which is the total number of words a person can recognize per minute (Yen, 2016). From this point of view, in this study, the number of words read in one minute is the basis for the determination of the reading speed of the students. After the students read the text with the silent reading method, they answered five multiple-choice questions related to the text without looking at the text again. The researcher guided the students in the process of recording the reading times and answering the multiple-choice questions to determine the level of comprehension and systematically recorded the data for later analysis.

From the second week of the studies, training in speed reading techniques was started by the researcher. Accordingly, perception, seeing, reading, speed reading, computer studies, text exercises (line, circle, punctuation, column studies), photographic reading (preparation, looking out of focus), pre-reading (browsing, goal setting, exercises), speed reading [increasing eye capacity, effective reading, reading with a purpose, flexible reading (browsing, skipping, scanning, selective reading), block reading] deep reading (note-taking techniques, cause-effect network, hierarchical table, mind map drawing) activities were done. In the last week of the 7-week (28-hour) implementation process, the students’ final reading speed and reading comprehension levels were determined over the same books and texts, and the studies were completed.

Data Collection Process

The 28-hour data collection process of the study is as shown in Table 3.

Table 1. Pretest-posttest experimental design without control group

Group	Pretest	Action	Posttest
Experimental	Q1	X1	Q2

Q1: Pre-test score of the experimental group

X1: 28 hours of speed reading training

Q2: Post-test score of the experimental group

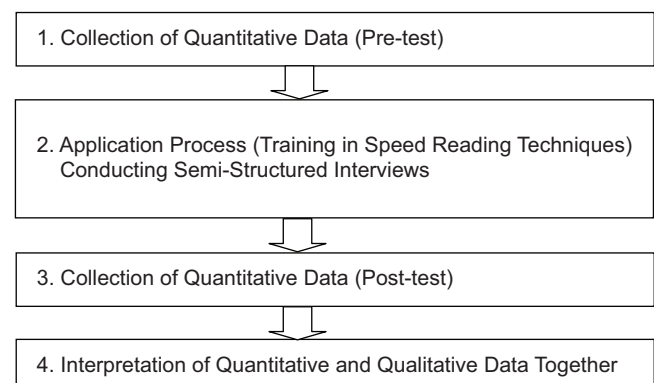


Figure 1. Schematic view of the nested mixed pattern used in the research

Data Collection Tools

In the pre-test phase of the study, the student's initial reading speed and comprehension levels were determined. For this purpose, a narrative and an informative text from Karaeloğlu's (2019) "Speed Reading with Understanding for Children" book were read to the students at one-week intervals. The number of words that students read in one minute in both texts was determined and the average of their initial reading speed was taken. The five-question test questions that the students solved based on these texts were also used to determine their reading comprehension levels. Each of the test questions is worth twenty points. The average of the scores of the students from both tests was taken and these scores were expressed as a percentage. For example, the comprehension level of a student with an average comprehension score of eighty was expressed as 80%. The students solved the tests without looking back at the text again. Following the start of the studies by taking the pre-tests in February 2020, a total of 28 hours of training in speed reading techniques covering the months of March, April, and May was implemented. This process was repeated over the same texts and questions for the post-tests. Post-test data were collected in the last week when the studies were completed. With the beginning of the studies, semi-structured interviews were conducted with each student. The three questions asked to students in the semi-structured interviews are as follows:

- Do you think that training in speed reading techniques contributes to your reading speed?
- Can you say that your comprehension level increases as your reading speed increases?
- Do you find training in speed reading techniques necessary?

According to the plan determined by the researcher, semi-structured interviews were conducted with the participants during each week in which the studies continued. Each interview lasted for 20 minutes on average, 14 interviews were conducted in each of the first 6 weeks, and 16 interviews were conducted in the 7th week during the 7-week period, and the opinions of all participants were sought.

The interviews were recorded with a voice recorder with the knowledge of the participants and subjected to content analysis.

Table 2. Grade Levels of the Students in the Study

Grade Level	Number of Students
4 th Grade	34
5 th Grade	33
6 th Grade	33
Total	100

Table 3. Data Collection Process of the Research

Months	Taking pre-tests	Training in speed reading techniques	Semi-structured interviews	Taking post-tests
February	x			
March		x	x	
April		x	x	
May			x	x

Analysis of Data

The analysis of the quantitative data obtained in the study was made with the SPSS 21 program, and it was revealed whether there was a significant difference between the pre-tests and the post-tests. The semi-structured interview forms, which comprised the qualitative stage of the study, were examined by the researcher by subjecting them to content analysis. As a result of the examination, the codes that emerged in the semi-structured interview forms were determined.

RESULTS

Findings on the Difference between Gifted Students' Pre-Post-Test Reading Speed of Narrative and Informative Texts

Regarding the first research question, "Is there a significant difference between the pre-post-test reading speed of the gifted students' narrative and informative texts?", the results obtained in the tests carried out for this question are as follows:

According to Table 4, it was found that there was a significant increase in students' reading speed in narrative and informative texts after training in speed reading techniques [$t(99)=-26.30, p<.01$] and [$t(99)=-22.48, p<.01$]. The students' average reading speed of the narrative text, which was $X=124.65$ before the application, increased to $X=175.99$ after the implementations. The mean reading speed of the informative text, which was $X=115.17$, increased to $X=161.43$. This finding is significant in showing that training in speed reading techniques increased the number of words that students read in one minute. Effect size calculation was also made in the study, and as a result of the t-test, a significant difference was found with a high effect value [Narrative text ($\eta^2=0.563$), Informative text ($\eta^2=0.527$)].

Findings on the Difference between Gifted Students' Pre-Post-Test Reading Comprehension of Narrative and Informative Texts

Regarding the second research question, "Is there a significant difference between the reading comprehension levels of gifted students in the pre-post-test of narrative and informative texts?", the results obtained in the tests carried out for this question are as follows:

According to Table 5, it was found that there was a significant increase in students' comprehension levels in narrative and informative texts after training in speed reading techniques [$t(99)=-18.41, p<.01$] and [$t(97)=-15.47, p<.01$].

Table 4. Narrative and Informative Text Pretest-Posttest Reading Speeds

Grade	Text	Groups	N	Mean	Std. Deviation	Std. Error Mean	t	p
4, 5, 6	Narrative	Pre-test	100	124.65	29.79	99	-26.30	0.000*
		Post-test	100	175.99	44.08			
4, 5, 6	Informative	Pre-test	100	115.17	28.04	99	-22.48	0.000**
		Post-test	100	161.43	44.53			

*p < 0.01, **p < 0.01

Table 5. Narrative and Informative Text Pretest-Posttest Comprehension Levels

Grade	Text	Groups	N	Mean	Std. Deviation	Std. Error Mean	t	p
4, 5, 6	Narrative	Pre-test	100	56.40	15.66	99	-18.41	0.000*
		Post-test	100	89.60	10.04			
4, 5, 6	Informative	Pre-test	100	59.18	14.62	97	-15.47	0.000**
		Post-test	100	89.39	10.82			

*p < 0.01, **p < 0.01

The narrative text comprehension level of the students, which was \bar{X} = 56.40 before the application, increased to \bar{X} = 89.60 after the implementations. The mean level of understanding the informative text, which was \bar{X} = 59.18, increased to \bar{X} = 89.39. This finding is important in that it shows that training in speed reading techniques provided students with higher levels of understanding in narrative and informative texts. Considering the effect value, a significant difference was found as a result of the t-test with a high effect value [Narrative text (eta squared = 0.783), informative text (eta squared = 0.761)].

Findings and Interpretation on Gifted Students Opinions

Regarding the third research question, "What are the opinions of gifted students on training in speed reading techniques?", the data obtained in the semi-structured interviews conducted for this question were subjected to content analysis by two different researchers and divided into codes. In the examination, the codes of productivity, academic success, positive attitude, improvement of reading, meaningful reading, turning into a habit, self-confidence, necessity and dissemination were revealed. Accordingly, the participants stated that training in speed reading techniques increased the efficiency of reading and that this would naturally contribute to academic success. The participants, who stated that the studies were a good step towards loving reading, stated that these studies are necessary in order to make reading a habit thanks to the development of reading speed and reading comprehension levels. In addition, they stated that training in speed reading techniques is a practice that should be included in the education-teaching process, not only with additional activities as in this study. Some of the prominent statements in the interviews with the students are as follows:

Before the speed reading training, I was not aware that I read slowly. As my speed increased, I realized how slowly I used to read. My comprehension rate has also increased. I wish these studies had never ended; frankly, it was very enjoyable. [P1]

Based on these statements, it can be said that gifted students gained awareness about reading after the speed reading techniques training and started to enjoy reading.

Previously, my parents insisted on making me read a book. When speed reading started, I started to love reading. My mother and I go to the bookstore every week to buy new books. I also became a member of the library, I buy three books a week from the library. My parents are very happy with this. [P14]

Speed reading techniques training has been an important step in the acquisition of reading habits by gifted students. After this education, students took an important step towards becoming independent readers without the need for family support.

Previously, I did not like to read paragraphs, especially in Turkish lessons. Other things came to mind while I was reading. I didn't understand what I was reading. When I applied the techniques shown by our teacher in the speed reading course, reading the paragraphs became much easier, and now it is more enjoyable for me to read. I started to be more active in Turkish lessons. I think my grades will be better at the end of the semester compared to the past. [P21]

These statements show that speed reading techniques training will contribute to the academic success of gifted students as they begin to like reading.

We have done these studies; our reading speed has increased, we have begun to understand what we read better, but I think these studies should be done in schools for the benefit of all students, rather than as separate courses. Thus, everyone can go a long way in reading speed and comprehension level. [P36]

As it can be understood from these expressions, speed reading techniques should be planned and applied in a way that all students in the education level will benefit.

I am in the 6th grade. If I had done these studies before, I could have read more books, been more successful and more cultured. I think it would be better if these studies were done from the lower classes onwards. [P48]

Gifted students are aware of the benefits of speed reading techniques training. For this reason, they think that this type of education should start in lower classes.

As soon as I started the studies, my reading speed started to increase, it was very enjoyable. I thought I understood exactly what I had read before, but it wasn't so. With this course, my reading comprehension level has also increased. I think these two are linked. In other words, as your reading speed increases, your comprehension rate increases as your attention level increases. [P59]

These statements show that gifted students should be given opportunities to increase their reading speed and comprehension levels.

The biggest benefit of these studies for me was the habit of reading. While I couldn't find time to read because of looking at the tablet and phone, now I put them aside and started reading books. [P64]

Like all students, gifted students are also affected by some negativities brought by the technology age. These statements show the important role of speed reading techniques education in preventing technology addiction.

If they asked me if I liked reading before the speed reading courses started, my answer would be no, but thanks to the techniques I learned in this course, I started to love reading. I finish at least three books a week. [P75]

When my reading speed increased and I started not to be afraid of the number of pages, I now read thick books. My father had world classics in his library, so I started reading them. My family was very surprised at this because I was too lazy to read even the books our teacher gave me before. [P82]

I used to read books before, and I was even the one who read the most in our class. These studies seemed like medicine to me because as my reading speed increased, I could read more books at the same time. I used to be the first in the class in Turkish lessons, now I will never lose this first place to anyone. [P97]

It was very enjoyable from the beginning to the end of the task. Our reading speed increased, our comprehension level increased. Obviously, we have confidence. Together we have completed a very enjoyable task. I wish such courses were always available. [P99]

The statements of P75, P82, P97, and P99 also show that gifted students should be supported in terms of reading speed and comprehension level like the previous statements. Because the students stated that this way they gained the habit of reading, they understood what they read better and this would contribute to their academic success.

DISCUSSION

The increase in the reading speed of the gifted students after the training in speed reading techniques in the study is consistent with the finding of Dedeali and Saracaloğlu (2010) that the "Speed Reading Technique has a positive effect on the reading speed of the students". However, it is not similar to the finding that training in speed reading techniques has no significant effect on the level of reading comprehension. In another study, Yen's (2016) conclusion that by increasing the reading speed achieved, the comprehension rate can be maintained and improved, is similar to the results obtained in this study. The finding in Öztahtalı's study (2011) that the

structural features of Turkish are suitable for reading according to speed reading techniques, and that an increase in reading speed will increase the comprehension rate is also in line with the results obtained in this study. In addition, the findings that the reading speed of students increases through training in speed reading techniques (Akçamete & Güneş, 1992; Chung & Nation, 2006; Macalister, 2008; Dedeali, 2008; Bozan, 2012; Kaçar, 2015; Kurudayıoğlu & Soysal, 2015; Yalçın et al., 2017; Mergen, 2019; Durukan, 2020) are similar to our results.

In this study, gifted students achieved an average reading speed of 168.71 after training in speed reading techniques. When this result is evaluated according to Göğüş's (1978) finding that "In Turkish, 50 words can be read in the second grade and 110 silent words can be read in the fifth grade. In the third grade of middle school, a good student can read 90 words out loud and 150 words silently, and the best reader in high school can read 200 words silently.", it can be said that the 4th, 5th and 6th grade students included in this study achieved a reading speed above their levels. Akçamete (1989) found the average reading speed of students to be 143.2 words per minute in his study on university students. He found a positive but low level relationship between students' reading speed and comprehension levels. Dökmen (1994) found that the average reading speed of high school students was 136.4 words per minute, and the average reading speed of university students was 145.4 words per minute. In a study conducted by Coşkun (2002) on high school students, the students' silent reading speed was determined as 155.9 words per minute in newspaper news, 140.4 words per minute in scientific texts, and 146.8 words per minute in literary texts. When evaluated according to the results, it can be said that the 4th, 5th and 6th grade students in this study achieved a reading speed above their level. This finding has also been reported by Bonds and Bonds (1983); Van Tassel-Baska, Johnson, Hughes and Boyce (1996); Reis et al. (2004); and Anderson, Tollefson and Gilbert (1985). Citing Harris and Sipay (1990), Cavazos-Kottke's (2006) study is consistent with the finding that gifted students read above the level of their peers. In Durukan's (2020) study, students who achieved a comprehension level of 67.25 in the pre-tests reached an average comprehension level of 86.25 at the end of the training in speed reading techniques. The fact that the mean level of understanding increased from 57.79 to 89.49 in this study shows that both studies achieved similar results. According to the results obtained in the 1st and 2nd questions of the research, the increase in the reading speed affects the students' reading comprehension level positively. This result is compatible with other studies that have obtained similar results (for example, Taufiq, 2018), but there are also studies that argue that there is no relationship between reading speed and reading comprehension (Datunsolang, 2013; Nursina, 2018; Naili & Laila, 2018; Ekasari, 2021) available. This situation can be explained by the existence of other variables that affect reading comprehension.

According to the opinions received from the students, it is seen that they stated that speed reading techniques would increase the reading speed and comprehension levels of the students, as well as contribute to their reading attitudes and

academic success. This result is similar to the result of Gezgin and Akcan (2019) that speed reading education increases students' vocabulary, they consume content (tests, books, etc.) faster, their motivation increases, and their perception, comprehension, and concentration of attention increase. The result of Yıldız's (2003) study that fluent reading improves students' reading motivation is also similar to this study. In other studies, Murniasih (2013) and Choirinintgyas (2018) found a positive relationship between reading speed and reading motivation. In this study, the results of the students' positive attitudes towards reading with the increase in their reading speed are similar to these studies. At the same time, the results of this study are compatible with Bilaya's (2021) conclusion that a program to be prepared for speed reading techniques will contribute to students' reading motivation.

CONCLUSIONS

In this study, the effect of training in speed reading techniques on the reading speed and reading comprehension levels of gifted students was investigated. Based on the results, it was concluded that the 28-hour training carried out in speed reading techniques significantly increased the reading speed and reading comprehension levels of gifted students. It has been concluded that training in speed reading techniques through semi-structured interviews carried out in order to support quantitative data with qualitative data in accordance with the design of the research, increases the reading speed and reading comprehension levels of students, as well as being an important step for students to make reading a habit. In addition, it has been concluded that studies can increase academic success by making positive contributions to other courses, especially the Turkish course, in terms of increasing reading comprehension. In addition, it has been concluded that the self-confidence of the students who have made progress in reading and comprehension will be strengthened, and that the studies conducted in this context can contribute to the self-confidence needs of gifted students.

In order for gifted students to establish healthy relationships in social life and to be successful in their professional lives, they should be individuals who read, understand what they read and express what they understand. For this reason, in order to increase the reading speed of gifted students and improve their reading comprehension levels, these students should be provided with training in the use of speed reading techniques. In this way, gifted students will be supported in developing their reading culture, doing better quality reading, making reading a habit, contributing to their academic success, ensuring social acceptance and participation by improving their social and cultural skills, and making progress in their self-confidence.

REFERENCES

- Akcan, M., & Gezgin, D. M. (2019). Bilgisayar destekli hızlı okuma eğitime ilişkin öğrenci görüşlerinin incelenmesi, The International Virtual Symposium of Innovations in Education and Social Sciences - IVSESS 2019.
- Akçamete, G. (1989). Üniversite öğrencilerinin okumalarının değerlendirilmesi. *Journal of Ankara University Faculty of Educational Sciences*, 2(22), 735-753.
- Akarsu, F. (2001). *Üstün zekâlı ve yetenekli çocuklar, aileleri ve sorunları*. Eduser Yayınları.
- Akçamete, G., & Güneş, F. (1992). Üniversite öğrencilerinde etkili ve hızlı okumanın geliştirilmesi. *Ankara University Journal of Faculty of Educational Sciences (JFES)*, 25(2), 463-471. DOI: 10.1501/Egifak_0000000597.
- Anderson, M. A., Tollefson, N. A. & Gilbert, E. C. (1985). Giftedness and reading: a cross-sectional view of differences in reading attitudes and behaviors. *Gifted Child Quarterly*, 29, 186-89. <https://doi.org/10.1177/001698628502900411>.
- Bilaya, A. (2021). Speed reading as a psychological problem *E3S Web of Conferences* 258, 1-9. <https://doi.org/10.1051/e3sconf/202125807062>
- Bilim ve Sanat Merkezleri Yönergesi. (2015). Retrieved from https://orgm.meb.gov.tr/meb_iys_dosyalar/2016_10/07031350_bilsem_yonergesi.pdf on 23.12.2020.
- Bonds, C., & Bonds, L. (1983). Reading and the gifted student. *Roepers Review*, 5, 4-6.
- Bozan, A. (2012). The effect of speed-reading education on the reading speed and comprehension levels of 10th grade students. (Unpublished Master Thesis). Çanakkale Onsekiz Mart University, Institute of Educational Sciences, Çanakkale.
- Bütün, M. (2017). *Araştırma yaklaşımının seçimi*. In S. B. Demir (Ed.), *Araştırma deseni nitel, nicel ve karma yöntem yaklaşımları* (ss. 3-23). Eğitim Kitap.
- Büyüköztürk, Ş. (2007). *Deneyisel desenler: Öntest-sontest kontrol grubu desen ve veri analizi*. Pegem A Yayıncılık.
- Cavazos-Kottke, S. (2006). Five readers browsing: The reading interests of talented middle school boys. *Gifted Child Quarterly*, 50(2), 132-147. <https://doi.org/10.1177/001698620605000205>.
- Chandler, K. L. & Ziegler, A. (2017). Learning resources in gifted education. *Journal for the Education of the Gifted*, 40(4), 307-309. <https://doi.org/10.1177/0162353217735148>.
- Choiriningtyas, D. (2018). The correlation between reading motivation and reading speed. Retrieved from <https://dspace.uui.ac.id/handle/123456789/13025> on 12.11.2021
- Coşkun, E. (2002). A research on silent reading speed and reading comprehension levels of high school second grade students (Unpublished Master Thesis). Gazi University, Institute of Educational Sciences, Ankara.
- Chung, M., & Nation, I. S. P. (2006). The effect of a speed reading course. *English Teaching*, 61, 181-204.
- Creswell, J. W., & Clark, P. (2011). *Karma yöntem araştırmaları*. Y. Dede & S. B. Demir (Eds.). Anı Yayıncılık.
- Creswell, J. W. (2017). *Karma yöntem araştırmalarına giriş*. M. Sözbilir. (Eds.). Pegem A Yayın Dağıtım.
- Çağlar, D. (1972). Üstün zekâlı çocukların özellikleri. *Ankara Üniversitesi Eğitim Bilimleri Fakültesi Dergisi*, 5(3), 95-110. https://doi.org/10.1501/Egifak_0000000389.

- Datunsolang, A. (2013). The correlation between students' reading speed and students' reading comprehension. English Department, Faculty of Letters and Culture, State University of Gorontalo. Retrieved from <https://repository.ung.ac.id/skripsi/show/321409164/the-correlation-between-students-reading-speed-and-students-reading-comprehension.html>
- Davaslıgil, U., & Leana, M. Z. (2004). "Üstün Zekâlı ve Zekâlıların Eğitimi Projesi", I. Türkiye Üstün Zekâlı ve Yetenekli Çocuklar Kongresi, Marmara University, İstanbul.
- Dedebali, N. C. (2008). The effect of speed reading technique on reading speed and reading comprehension levels of eighth grade students (Unpublished Master Thesis). Adnan Menderes University, Institute of Social Sciences, Aydın.
- Dedebali, N. C., & Saracaloğlu, A. S. (2010). The effects of rapid reading technique on the eighth graders' reading speed and levels of reading comprehension. *Pamukkale Üniversitesi Eğitim Fakültesi Dergisi*, 27, 171-183. Retrieved from <https://dergipark.org.tr/pub/pauefd/issue/11116/132939>.
- Dökmen, Ü. (1994). *Okuma becerisi, ilgisi ve alışkanlığı üzerine psiko-sosyal bir araştırma*. MEB Yayınları.
- Durukan, E. (2020). Impact of speed reading training on reading speeds and comprehension skills of secondary school students. *Cypriot Journal of Educational Science*, 15(2), 184-193. DOI:10.18844/cjes.v15i2.4491.
- Ekasari, I. N. (2021). The correlation of reading speed and reading comprehension in xreading. *RETAIN (Research on English Language Teaching in Indonesia) (e-Journal)*, 09(03), 51-57.
- Göğüş, B. (1978). *Orta dereceli okullarımızda Türkçe ve yazın eğitimi*. Kadioğlu Matbaası.
- Hallahan, D. P. & Kauffman, J. M. (1994). *Exceptional children: Introduction to special education* (6th ed.). Allyn and Bacon.
- Kaçar, K. (2015). The effect of speed reading training on secondary school 7th graders' reading comprehension skills and attitudes on reading (Unpublished Master Thesis). Fırat University, Institute of Educational Sciences, Elazığ.
- Kara, M., & Ünal, M. (2019). Corpus linguistics-based analysis of the word existence of written expressions of special talented students. *International Journal of Languages' Education and Teaching*, 7(1), 252-261. DOI:10.18298/ijlet.3270.
- Karaeloğlu, Ö. (2019). *Çocuklar için anlayarak hızlı okuma*. Fom Kitap.
- Kurudayıoğlu, M., & Soysal, T. (2015). The impact of speed reading techniques on the rate of reading and level of comprehension of the fifth grade students. *International J. Soc. Sci. & Education*, 5(4), 547-558. Retrieved from <http://ijsse.com/sites/default/files/issues/2015/v5i4/Paper-03.pdf>.
- Kaya, Z., & Bayra, E. (2019). The metacognitive thinking skills of gifted and talented students, 3(2), 49-76. <https://doi.org/10.30561/sinopusd.644745>.
- Macalister, J. (2008). The effect of a speed reading course in an English as a second language environment. *The TESOLANZ Journal*, 16, 23-33.
- Mergen, S. (2019). The effect of speed reading technique on reading speeds and reading comprehension levels of second grade students (Unpublished master thesis). Akdeniz University, Antalya, Turkey.
- Murniasih (2013). The correlation between students' motivation in reading and their reading speed. Retrieved from <https://repository.uinjkt.ac.id/dspace/bitstream/123456789/24658/1/Murniasih.pdf> on 20.11.2021.
- Naili, I., & Laila, I. (2008). A correlative study of reading speed and reading comprehension of the second year students of Smp Islam Sultan Fattah Salatiga in the academic year of 2007/2008. English Department of Educational Faculty State Institute for Islamic Studies (STAIN) Salatiga.
- Nursina, D. (2018). The correlation between reading speed toward student comprehension at eight grades of pondok pesantren. Universitas Islam Negeri Sulthan Thaha Saifuddin Jambi.
- Oğurlu, Ü. (2014). Gifted and talented students' reading interest, attitude and critical reading skills. *Ankara Üniversitesi Eğitim Bilimleri Fakültesi Özel Eğitim Dergisi*, 15(2) 29-41.
- Öztahtalı, İ. İ. (2011). Speed-reading techniques and the implementability in Turkish. *U. Ü. Fen-Edebiyat Fakültesi Sosyal Bilimler Dergisi*, 12(20), 81-89. Retrieved from <https://dergipark.org.tr/tr/download/article-file/214869>.
- Reis, S., Gubbins, E., Briggs, C., Schreiber, F., Richards, S., Jacobs, J., Eckert, R. & Renzulli, J. (2004). Reading instruction for talented readers: case studies documenting few opportunities for continuous progress. *Gifted Child Quarterly*, 48(4), 315-338. DOI:10.1177/001698620404800406.
- Renzulli, J. S. (1978). What makes giftedness? Re-examining a definition. *Phi Delta Kappan*, 60, 180-184. <https://doi.org/10.1177/003172171109200821>.
- Renzulli, J. S. (1986). The three-ring conception of giftedness: A developmental model for creative productivity. In R. J. Sternberg & J. E. Davidson (Eds.), *Conceptions of giftedness* (pp. 53-92). Cambridge University Press.
- Ruşen, M. (1995). *Hızlı okuyarak anlama ve seçmeli okuma yöntemleri*. Alfa Yayınları.
- Sak, U. (2011). *Üstün zekâlılar özellikleri tanımlanmaları eğitimleri*. Maya Akademi.
- Schiever, S., & Maker, C. (2003). New directions in enrichment and acceleration. In N. Colangelo & G. Davis (Eds.), *Handbook for gifted education*, 3rd Edition (pp. 163-173). Allyn & Bacon.
- Sönmez, V., & Alacapınar, F. G. (2013). *Örneklendirilmiş bilimsel araştırma yöntemleri*. Anı Yayıncılık.
- Steiner, H., & Carr, M. (2003). Cognitive development in gifted children: toward a more precise understanding of emerging differences in intelligence. *Educational Psychology Review*, 15, 215-246.
- Taufiq, H. W. (2018). The correlation between students' reading speed and their reading comprehension in narrative

- text at the second semester of the twelfth grade at sman 1 sumberejo in the academic year of 2017/2018. Tarbiyah and Teacher Training Faculty Raden Intan State University of Islamic Studies Lampung.
- TDK. (2021). Güncel Türkçe sözlük. Retrieved from www.tdk.gov.tr on 10.01.2021.
- Vantassel-Baska, J., Johnson, D., Hughes, C., & Boyce, L. (1996). A study of language arts curriculum effectiveness with gifted learners. *Journal for the Education of the Gifted, 19*, 461-480.
- Walden, S. L. (2014). The experiences of gifted education teachers' working with gifted students: A case study [Doctoral Dissertation]. Capella University.
- Yalçın, A., Erdoğan-Çeltik, S., & Altınok, Ş. (2017). The evaluation of fast reading abilities of law faculty students. *Ahi Evran Üniversitesi Kırşehir Eğitim Fakültesi Dergisi, 18*(3), 100-114.
- Yen, T. T. N. (2016). EFL reading speed and reading comprehension. *IOSR Journal of Humanities and Social Science (IOSR-JHSS), 21*(10), 01-10.
- Yıldırım, A., & Şimşek, H. (2008). *Sosyal bilimlerde nitel araştırma yöntemleri* (6th ed.). Seçkin Yayıncılık.
- Yıldız, M. (2013). The role of the reading motivation, reading fluency and reading comprehension on Turkish 5th graders' academic achievement. *Turkish Studies - International Periodical for the Languages, Literature and History of Turkish or Turkic, 8*(4), 1461-1478.
- Yörük, S. (2020). Okul öncesi dönemde özel yetenekli bir çocuk yetiştirmek. *Çocuk ve Medeniyet, 5*(10), 337-364. <http://dx.doi.org/10.47646/CMD.2020.213>.