

Review Article

A systematic analysis of studies on reading skills with specific learning disabilities: The case of Türkiye

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In special education, specific learning disabilities are characterized by difficulties in writing, mathematics, and reading. There is a high prevalence of reading disabilities among students with specific learning disability. Current systematic analysis examines the studies conducted in Türkiye in the field of specific learning disability. A total of 36 articles published between 2000 and 2022 were included in the research. Based on years, aims, research designs, dependent and independent variables, participants, materials/data collection tools, and results, the data have been tabulated and presented. During the last five years, there has been a greater amount of research on this subject, and the majority of it has been done with a quantitative research design. It has been found that reading comprehension has been used most as a dependent variable, while teaching methods have been most frequently used as an independent variable, and the participants are mostly primary school students with specific learning disabilities. Tests and forms were the most commonly used data collection tools. In order to formulate a general perspective, the research results were evaluated using the relevant literature.

Keywords: Specific learning disability, Document analysis, Reading

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1. Introduction

Specific learning disabilities [SLD] generally define individuals who show significantly lower academic achievement than their peers, regardless of general mental capacity deficiency. In the SLD, which manifests itself with inadequacy in one or more of the fields of reading, writing, and mathematics. They experience a great deal of inadequacies, especially in reading. SLD is the loss of functionality in one or more areas of reading, writing, mathematics, listening, speaking and reasoning, and is a developmental and neurobiological disorder that is frequently seen in childhood (Araz-Altay & Görker, 2018; Silver et al., 2008).

The most common types of SLD affect reading, writing, and math; attention, language, and behavior can occur with other disabilities that affect learning. Dyslexia is a reading disability, dyscalculia is a math disability, and dysgraphia is an inability to write (Cortiella & Horowitz, 2014). It is known that 85% of students with SLD have difficulties in reading (Çakıroğlu, 2017).

“In addition, in the Fifth Edition of the Diagnostic and Statistical Manual of Mental Disorders [DSM-5], in school-age children from different languages and cultures; the prevalence of SLD, which includes the educational fields of reading, writing, and mathematics, was determined as 5-15%.” (Araz-Altay & Görker, 2018, p.127, DSM-5, 2013)

In the Special Education Services Regulation, which is prepared for individuals with special needs and is mostly used in practice in Türkiye, special education is defined as the education provided to individuals

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who differ significantly from their peers in terms of individual, developmental characteristics and educational qualifications, with developed training programs and expert personnel trained in this field, in appropriate environments. Moreover, individuals with SLD describes individuals who have difficulties in mathematical operations, spelling, listening, reading, speaking, writing or concentration in the processes of obtaining information to understand and use the written or spoken language (Ministry of National Education [MoNE], 2006).

It is seen that there are studies on students with SLD in Türkiye. Görgün and Melekoğlu (2019a) reviewed the scientific studies conducted in Türkiye between 1972 and 2017 on SLD. According to the research results, it has been determined that research on different subjects has been carried out. It was seen that the highest rate was the evaluation and support of reading skills with a rate of 15.7%. Despite the increasing number of studies in this field, especially in the last 10 years, it is stated that there is limited scientific knowledge in this field. According to Çakıroğlu (2017), the number of trained personnel, experts, and researchers is also insufficient and there are diagnostic problems related to SLD in Türkiye. In addition, statistical data on students with SLD are also limited.

İlker and Melekoğlu (2017) revealed that most of the studies were conducted on writing strategies (self-development strategy), the studies were mostly focused on fourth-grade students in primary school, and the number of male participants was higher. Moreover most of the studies were experimental or single-subject designs. Özkubat et al.'s (2022) comprehensive literature review put forths that problem-solving skills of various problem-solving instructional interventions (direct instruction, concrete-semi-concrete-abstract strategy, schema-based approach, self-regulation strategy, and hint cards, STAR strategy, clear expression, LAP strategy, visual strategies, Solve It! and SOLVE strategy) are effective on SLD. Yıldız (2004) examined the psychosocial characteristics of children with SLD, students' problems, and their education. The academic and social problems these students experience include low self-esteem, inadequacies in social development, and not being accepted by peers and teachers. He suggests that preventive and interventional programs prepared for SLD should include self-development, empathetic behavior, the development of social relationships with people around them, and appropriate academic support.

Grigorenka et al. (2020) tried to reveal the historical and contemporary trends of SLD in research and practice. It also celebrates the 50th anniversary of the recognition of an SLD as a disability in the United States of America. SLD represents 5-15% of the school-age disability population. In addition to the low risk of academic disability and related functional social, emotional, and behavioral difficulties, individuals with SLD have worse long-term social and occupational outcomes. If the necessary interventions are not made for the SLD that occurs at a high rate, it has lifelong negative effects. For this reason it is important that effective prevention, surveillance, and intervention systems, including experts from different disciplines, are established for individuals with SLD and that these systems are sustainable. The key components of Reschly's (2014) Response to Intervention Model [RTI] include multiple intervention stages to accurately diagnose a SLD. The aims of RTI are prevention, early diagnosis, and intervention in general education, an intensive intervention offered to children with severe and chronic achievement and behavior problems. Diagnosing an SLD encompasses several stages that must meet the requirements of the Individuals with Disabilities Education Act [IDEA] (IDEA, 2004). When making a comprehensive assessment, at least 12 areas should be examined, and an in-depth assessment should be made in areas where there are deficiencies in education.

The main purpose of this study is to evaluate the studies on the reading skills of students with SLD in Türkiye by systematically reviewing and discussing the studies by comparing them. In this direction, research between the years 2000-2022 was searched and obtained from databases with relevant keywords. Hence the research question is as follows: What are the current situation and trends regarding the reading skills of students with SLD in Türkiye? It is aimed to reveal the positive and negative aspects of the Türkiye. For these purposes, answers to the following research questions were sought:

RQ 1) What is the distribution of studies on the reading skills of students with SLD in Türkiye by year?

RQ 2) What are the aims;

RQ 3) What are the research designs;

RQ 4) What are the dependent variables;

RQ 5) What are the independent variables;

RQ 6) Who are the participants/sample;

RQ 7) What are the materials/data collection tools, and

RQ 8) What are the findings of the researches conducted in Türkiye between the years 2000-2022 on the reading skills of individuals with SLD?

2. Method

This research is a qualitative study evaluating studies conducted in Türkiye on reading skills with students with SLD. Since the articles to be examined within the scope of the research will be obtained from electronic databases, the document analysis method was used and the collected data were analyzed with the descriptive analysis technique. Document analysis is a technique of collecting data from existing records and documents. Accumulation and continuity in knowledge are provided by documents that are the mirror of the past (Karasar, 2017).

2.1. Search Procedure

Google Scholar, ERIC, ProQuest, SAGE, EbscoHost, Science Direct, Wiley, Scopus, Springer, Taylor & Francis, TÜBİTAK ULAKBİM, and Dergipark databases were used in the searches on Turkish and English words and word groups. The keywords included "learning disability", "learning difference", "dyslexia", "learning disabilities reading", "learning disabilities", "specific learning disabilities", "dyslexia reading", "specific learning disabilities reading" and "learning difference reading", "reading learning disability" and "special learning disability". In this research Eskişehir Osmangazi University Library were used, and the search was carried out by selecting "all providers" as the database.

2.2. Inclusion and Exclusion Criteria

Inclusion and exclusion criteria were determined for the search of publications. The inclusion criteria were determined as; a) the studies are published in peer-reviewed journals, b) the studies were conducted between 2000-2022, c) the studies were accessible from an electronic database, e) the studies were written in Turkish and/or English, f) reading skills (early literacy, primary reading teaching, reading fluency, reading comprehension, phonological awareness, phonology, prosodic reading, vocabulary teaching, etc.) have been examined g) the origins of the studies is Türkiye. The exclusion criteria of the publications were determined as a) the study was conducted outside the specified years, b) the study was conducted with individuals other than those diagnosis with SLD, and c) the type of the study was a thesis/dissertation.

Considering these inclusion and exclusion criteria, and predetermined keywords, a total of 70 articles were reached. After excluding the nonrelevant and identical publications, a total of 36 articles were obtained within the scope of the research. The articles within the scope of the research were analyzed according research questions.

3. Results

This study aims to evaluate the studies on the reading skills of individuals with SLD between the years 2000-2022 in Türkiye by systematically examining and identifying them with relevant keywords from databases. As a result of the research carried out in this direction, a total of 36 articles were reached. Retrieved articles were tabulated and charted according to years, aims, research designs, dependent and independent variables, participants/samples, data collection tools, and results. Figure 1 presents the distribution of the researches by years.

Figure 1

Distribution of Researches by Years

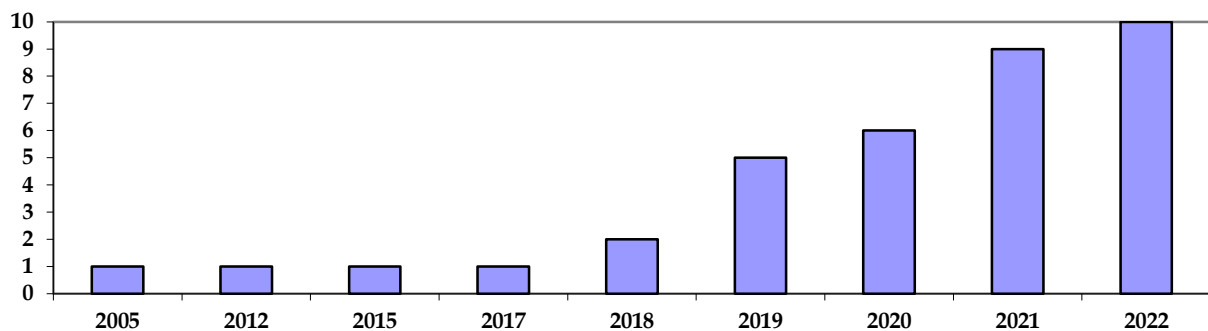
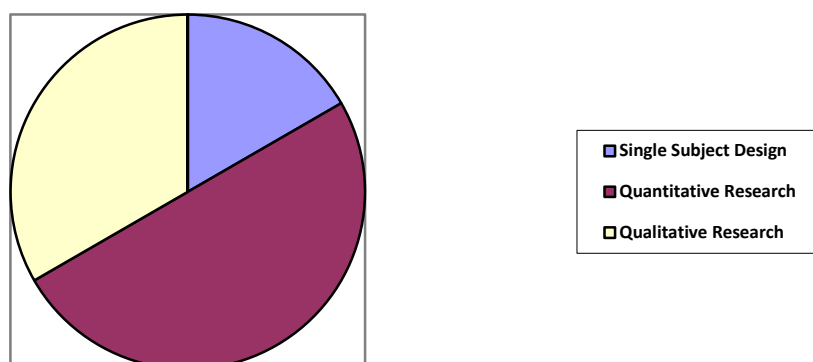


Figure 1 shows that 10 of the researches were published in 2022, nine of them in 2021, six of them in 2020, five of them in 2019, two of them in 2018, and the rest in previous years. Figure 2 presents the distribution of the researches according to the research designs.

Figure 2
Distribution of Researches According to Research Designs



Of the 36 articles reached within the scope of the research, 18 of them were conducted with quantitative research methods, 12 of them were conducted with qualitative research methods, and six of them were conducted with single-subject research methods.

Of the quantitative studies, four of them were designed with the relational design, four of them with the descriptive survey model, two of them with the survey research model, two of them with a comparative descriptive research design, one of them with a quasi-experimental design, one of them with a causal-comparative model, one of them with descriptive correlation model, one of them with cross-sectional survey and descriptive survey model, one of them with multisample parallel multiple mediation model, and one of them with causal descriptive survey model. Of the qualitative studies, four of them were designed with document analysis, two of them with phenomenological research, two of them with case study method, one of them with the descriptive method, one of them with the semi-structured method, one of them with action research and one of them with program development research.

The publications were examined in terms of the dependent variables and the dependent variables of 12 articles could not be reached (Non-available (N/A)). Six of them used reading comprehension skills variable, four of them reading and writing skills (literacy) variable, four of them reading skills variable, four of them reading and reading comprehension skills variable, one of them reading comprehension skills variable, one of them with metacognitive reading comprehensive strategies variable, one of them reading fluency skills variable, one of them reading comprehension and verbal problem-solving skills variable, one of them cognitive and metacognitive reading strategies variable, one of them attention performance levels variable, one of them intrinsic motivation and reading comprehension variable.

The publications were examined in terms of the independent variables and the independent variables of 11 articles could not be reached. Eight of the researches used teaching method variable, three of them instruction material variable, three of them strategy variable, three of them program variable, one of them class size, gender, and correct reading rates variables, one of them gender, grade levels, schools, and socioeconomic levels variables, one of them the pragmatic language skill variables, one of them the linguistic features variable, one of them the morphological awareness variable, one of them the grade and age levels variables, and one of them the reading fluency skill levels variable.

After the examination of the articles within the scope of the research, it has been concluded that seven of the studies were conducted with students with SLD in primary school, six of them with students with SLD and peers with typically developed in primary school, five of them with students with SLD in secondary school, three of them with researchers, theses and articles, three of them with students with SLD in primary school and teachers, three of them with typically developed students in secondary schools, two of them with students with SLD in primary and secondary schools, one of them with textbooks, one of them with students with typically developed in secondary schools, one of them with students with SLD in primary and secondary school, teachers and parents, one of them with students with SLD and peers with typically developed in primary school and teachers, and one of them with teachers. One of the articles' participants were not available.

The articles were also examined in terms of materials/tools. Eleven of the articles used the tests, six of them used the forms, four of them used texts, etc. and questions, four of them used tests and forms, three of them used inventory, two of them used tests, forms and researcher diaries, one of them used the program, and one of the articles' data collection tool was not available.

Table 1
Studies in Türkiye on Reading Skills on SLD

Study	Aim	RD	DV	IV	P/S	M/T	Results
1. Özmen (2005)	To compare the reading speeds of students with SLD in stories and tales they know and those they don't know.	Single subject design (ABAB Model).	Several correct words are read in one minute in texts.	Stories and fairy tales that the student knows and does not know.	Two male students in the second and fifth grades students with SLD	Texts that students have not read before and stories and fairy tales they know.	The reading speed of the students increased while reading the stories and fairy tales they knew.
2. Ergül (2012)	To examine the frequency of the third grade students who were reported to have reading problems, what kind of a pattern their reading performance and errors formed, and to evaluate the reading performance of the students in terms of the risk of SLD based on the norms obtained from the studies conducted on reading speed in Türkiye.	Quantitative Research (Relational survey).	Frequency and reading performance (Reading speed and errors) of students with reading problems in designated classes.	Reading levels are based on class size, gender, and correct reading rates.	112 students who have difficulty in reading attending the third grade of primary school.	Teacher Interview Form and the Measure of Reading Fluency.	Students in the "frustration" group performed poorly in both correct reading and speed-reading. The reading performances of student's at all three levels are compatible with the reading performances of students with SLD defined in the literature.
3. Çakıroğlu (2015)	To determine the readability levels of the texts in primary school (first-fourth grade) Turkish textbooks by using the formulas developed for Turkish and to compare these levels with expert opinions.	Qualitative Research (Descriptive method).	-	-	41 texts in primary school first, second, third and fourth grade textbooks.	Readability evaluation formulas.	The texts in the Turkish textbooks from the first grade to the fourth grade of primary school are at an "easy" level on average according to its values; Some texts in the third and fourth grade levels have a "medium" level of difficulty. The readability values of the texts increased as the grade level increased.
4. Uçar-Rasmussen & Cora-İnce (2017)	To examine the effectiveness and generalizability of the thinking aloud method in teaching metacognitive reading comprehension strategies by determining whether individuals with SLD have reading comprehension problems and use metacognitive reading comprehension strategies.	Single subject design (Multiple baseline design).	Learning level of metacognitive reading comprehension strategies.	Think aloud method.	Three students attending fifth and sixth grades students with SLD.	Nine reading texts and fifteen questions.	Individuals with SLD have difficulty understanding what they read such as answering the questions in the given reading texts (WH), predicting the events in the text, remembering the sequence of events, making inferences, and using metacognitive strategies such as making predictions, visualizing, associating with prior knowledge, monitoring and correcting. The method was effective in increasing the reading comprehension levels of individuals and using metacognitive reading comprehension strategies and that the method provided a significant improvement in the generalization of these individuals' strategies to different reading texts.

Table 1 continued

<i>Study</i>	<i>Aim</i>	<i>RD</i>	<i>DV</i>	<i>IV</i>	<i>P/S</i>	<i>M/T</i>	<i>Results</i>
5. Şahin & Çakır (2018)	To investigate the effect of multimedia teaching material on the literacy skills of primary school students who have difficulty in reading and writing in the second, third, and fourth grades despite finishing the first grade.	Quantitative Research (A quasi-experimental design with the pretest-posttest control group).	Students' reading and writing skill.	Multimedia materials.	30 students attending the second, third and fourth grades of primary school with literacy difficulties.	Reading-Skill Rubric, Read-write speed measurement, Teacher interview questions.	There was no significant difference between the reading and writing speeds of the groups. There was a significant difference in the literacy process skills and reading skills in favor of the experimental group, while there was no significant difference between the two groups in writing skills. Multimedia materials increased students' interest in the lesson and contributed to their literacy skills.
6. Çakıroğlu et al. (2018)	To determine the opinions of teachers and students on the use of reading software developed for students with SLD within the scope of the TUBITAK project.	Qualitative Research (Semi-structured interviews).	Reading skills of students with SLD.	Computer-assisted reading instruction.	10 students with SLD and 10 teachers attending the second, third, and fourth grades of primary school.	Interview Questions.	The participating teachers stated that the computer software developed had a positive effect on student performance. Participant students stated that they preferred to use the software developed in activities for reading skills.
7. Görgün & Melekoğlu (2019b)	To design the Support Training Program for Reading Fluency and Comprehension to support the reading fluency and reading comprehension skills of students with SLD.	Qualitative Research (Semi-structured interview, Observation, Document review, and researcher's diary, phenomenological research method).	-	-	Interviews were made with six teachers and 11 students with SLD attending primary school were observed.	Interview Questions.	While working with students with SLD, teachers sometimes have more familiar features such as repeated reading, giving homework, and getting the support of the family. They sometimes use methods such as making videos and using tablets teachers needed a reading program for students with SLD students with SLD have self-confidence problems.
8. Balcı, (2019)	To examine the reading fluency skill levels of secondary school students with SLD according to gender, class, and socioeconomic level of the school they attended.	Qualitative Research (Case study).	Reading fluency skills of students with SLD.	Gender, grade levels, schools they attended, and socioeconomic levels.	47 students with SLD attending secondary school.	Video footage and The "Prosodic Reading Scale".	The prosody skills, correct reading skills, and reading speed of students with SLD are considerably lower than the expected level. The reading fluency skills of these students did not differ according to class and gender. The students at the low socioeconomic level read more fluently than the others. However, they remained below the average and could not reach the expected reading fluency skills.
9. Fürsün & Sarı (2019)	To examine the studies on the reading comprehension skills of students with SLD in primary schools.	Qualitative Research (Document analysis).	-	-	17 types of research, including five theses and 12 articles.	Data collection form.	Students with SLD mostly use reading comprehension skills and it shows that it is addressed through the comparison of students who are not. The study was conducted with primary school students and that the number of male students included in the research was higher. The studies were mostly designed with a single-subject research or correlational model. There was a significant difference between the groups in terms of intrinsic motivation, prior knowledge, reading speed, strategy use and phonics skills.

Table 1 continued

Study	Aim	RD	DV	IV	P/S	M/T	Results
10. Melekeoğlu et al. (2019)	To develop and evaluate the usability of SOBAT®, which was developed to evaluate the reading and reading comprehension skills of children aged 7-14 with SLD.	Quantitative research designs and the survey and research method.	Reading and reading comprehension skills.	SOBAT®	197 students aged between 7-14 participated in the study.	SOBAT® tests.	SOBAT®-II could be easily applied to primary and secondary school students. New texts should be added with a high level of difficulty, especially at the secondary school level.
11. Kumaş et al. (2019)	To examine whether there is a relationship between reading comprehension skills and verbal problem solving of students with and without SLD and whether reading comprehension skills are predictive of verbal problems.	Quantitative Research (Causal comparative model through survey).	Reading comprehension and verbal problem solving skills of students with and without SLD.	Verbal problem.	120 students, 60 of whom are students with SLD and 60 peers with typical development, attending the fourth grade.	Non-Formal Reading Inventory (FOOE, Verbal Problem Questions).	Reading comprehension is an important predictor of verbal problem solving. Students with SLD scored lower in reading comprehension than their peers with typical development, completed the tasks in a longer time, and solved fewer operations correctly.
12. Delimehmet-Dada & Ergül (2020)	To determine the vocabulary and reading comprehension performances of third and fourth grade students with SLD and to examine the relationship between these skills in comparison with peers with typical development.	Quantitative research (Descriptive correlation design).	-	-	30 students with SLD and 30 peers with typical development attending third and fourth grades.	Turkish Expressive and Receptive Language Test (IERL.T) and Informal Reading Inventory (IRI).	Students with SLD in vocabulary and reading comprehension skills performed significantly lower than their peers with typical development. There is a partially significant relationship between the skills of students with SLD; there is no significant relationship between these skills in students with typical development.
13. Firat & Ergül (2020)	To examine the effect of the TWA (Think Before Reading, Think While Reading, and Think After Reading) strategy on the acquisition of cognitive and metacognitive reading strategies by students with SLD.	Qualitative method (Case study).	Cognitive and metacognitive reading strategies of students with SLD.	TWA (Think Before Reading, Think While Reading, and Think After Reading) strategy.	Three students with SLD in Sixth grade.	Think Aloud Technique, Semi-Structured Interviews, And Social Validity Form.	TWA strategy teaching was effective in acquiring cognitive and metacognitive strategies of participant students before, during, and after reading.

Table 1 continued

Study	Aim	RD	DV	IV	P/S	M/T	Results
14. Yıldız & Melekoğlu (2020)	To examine the intervention studies conducted between 2000 and 2017 on the development of reading comprehension skills of individuals with SLD.	Qualitative method (Review study)	-	-	21 studies were included in this study.	Data collection form.	Most studies have been done on the effectiveness of story mapping and self-management strategies. Male participants were more numerically and they were at the secondary school level.
15. Seçkin-Yılmaz, Yaşaroğlu (2020)	To comparatively examine the reading comprehension, reading speed, vocabulary, and verbal memory performances of primary school third grade students with SLD and with peers with typical development.	Quantitative research (Comparative descriptive research design).	-	-	44 students, 22 of whom were diagnosed with SLD and 22 peers with typical development, attended the third grade of primary school.	Vocabulary subtests of Turkish School Age Language Development Test and Working Memory Scale.	Students with SLD were significantly unsuccessful in the assessments of reading comprehension, reading speed, vocabulary, and verbal working memory than their peers with typical development. Significant relationships were found between the variables in both groups.
16. Seçkin-Yılmaz & Büyükkçakmak (2020)	To comparatively examine the word reading and phonological processing skills of students with SLD and those with peers with typical development.	Quantitative research (comparative descriptive research design).	-	-	A total of 40 students, 20 with SLD and 20 without SLD, attending the third grade of primary school.	Turkish Word Reading Test, Phonological Awareness Assessment Tool, Rapid Naming Test, and Verbal short-term memory subtest of Working Memory Scale.	Students with SLD were significantly less successful than their peers with typical reading achievement in all skills. There were significant relationships between word reading skills and phonological processing skills of students with and without SLD.
17. Deniz & Aslan (2020)	To evaluate the effect of the story map technique on the reading comprehension ability of a student with SLD.	Qualitative method (Action research).	Reading comprehension skills.	Story mapping technique.	One female student attending sixth grade with SLD.	'Reading Comprehension Inventory'.	The story mapping technique was effective in the reading comprehension skills of the student participating in the research.

Table 1 continued

<i>Study</i>	<i>Aim</i>	<i>RD</i>	<i>DV</i>	<i>IV</i>	<i>P/S</i>	<i>M/T</i>	<i>Results</i>
18. Kazan & Gökkbulut (2021)	To reveal the difference between the skills of reading from the screen and reading from printed documents in students with SLD.	Quantitative research methods (Descriptive survey model).	Reading skills.	Screen reading, reading from printed materials.	22 students with SLD attending the fifth grade of secondary school.	Text "Misunderstanding Analysis Inventory" Multidimensional Fluency Rubric, One Line Thousand Worlds: Cartoon Character".	The student's reading speed was low and in the risk, group compared to the number of words they read in one minute. The average number of words correctly read by the student with SLD participating in the study was observed to be at the "Anxiety Level". The prosody (emphasis, tone, fluency, etc.) score averages of the students participating in the study were low. There was no significant difference between the group reading from the screen and the group reading from the paper. No significant difference was found between reading from the screen and reading from the paper, according to the number of words read correctly. The average prosody level of the students who read from the screen compared to those who read from the paper was found to be low.
19. Kılıç-Tülü et al. (2021)	To determine the effect of 3D (TWA) strategy teaching carried out according to the SRSD model on the reading comprehension skills of students with SLD in informative texts.	Single-subject experimental designs (Multiple-baseline across participants).	Reading comprehension performances.	3D (TWA) strategy instruction conducted according to the SRSD model.	Four fourth grade male students with SLD.	Multiple choice tests, sound records.	The 3D (TWA) strategy teaching carried out according to the SRSD model is effective on the students' text comprehension questions and their performance of explaining the text. The strategy teaching made according to the SRSD model has an effect on the student's reading comprehension skills shows it to be effective.
20. Etilan & Acarlar (2021)	To compare the relationship between pragmatic language skills and reading comprehension skills of students with and without SLD.	Quantitative research methods (Relational survey model).	Reading comprehension skill.	Pragmatic language skill.	Total of 62 students, 31 of whom were in the fifth and sixth grades, with SLD and 31 peers with typical development.	Pragmatic Language Skills Inventory and the Non-Formal Reading Inventory toolkits.	Students with SLD received lower scores in pragmatic language skills and reading comprehension skills than their typically developing peers. Reading comprehension skills and students' pragmatic language were independently associated with the diagnosis in both typically developing children and SLD.
21. Gündoğdu et al. (2021)	To comparatively examine the reading comprehension performances of students with and without SLD in terms of linguistics.	Quantitative research methods (Descriptive survey model).	Reading comprehension performances.	Linguistic features.	120 students with typical development and 120 students with SLD attending third and fourth grades.	Reading Aloud Test, Reading Comprehension Assessment Tool, Researcher's diary.	There was a difference between students with SLD and those with typical development. There were some differences in reading comprehension skills. There were significant differences between the two groups in reading comprehension skills and that these differences were shaped independently of grade level is emphasized.

Table 1 continued

<i>Study</i>	<i>Aim</i>	<i>RD</i>	<i>DV</i>	<i>IV</i>	<i>P/S</i>	<i>M/T</i>	<i>Results</i>
22. Sümer-Dodur (2021)	To comparatively examine the morphological awareness (derivative suffix, inflectional suffix) performances of children with and without SLD.	Quantitative research methods (Descriptive survey model).	Literacy.	Morphological awareness.	50 students with typical development and 50 students with SLD attending fourth and sixth grades.	Tool to evaluate construction and inflectional suffix skills at the word production level.	Although the vocabulary reading skills of students with SLD showed similar performance with their typically developing peers in terms of typical development, it was seen that the morphological awareness performance of the students was lower than the students with typical development. The performance differences between the groups persist significantly even as the education level of the students increases.
23. Gökdemir & Yakut (2021)	To determine the performance of students with SLD at grade and age levels by examining their reading comprehension, accurate reading, and reading speed.	Quantitative research methods (Descriptive survey model).	Reading comprehension and reading speed skills.	Grade and age levels.	79 students with SLD in their third grade.	The Oral Reading Skill and Reading Comprehension Test.	98.73% of the students were below the chronological age and grade level in reading accuracy, 100% reading comprehension, and 100% reading speed skills performance has been demonstrated. Correct reading, reading comprehension, and reading speed skills affect each other.
24. Kayahan-Yüksel & Emmioğlu-Sarıkkaya (2021)	To design a draft-training program for mothers in order to support the participation of mothers in the literacy education process of children with SLD and to examine the implementation results by referring to the draft program.	Qualitative methods (interview, observation, researcher diary, program development research).	Literacy skills of children with SLD.	An educational program for mothers.	First, fourth, and sixth grade students with SLD, four teachers, and four parents participated in the research.	Semi-Structured Interview Forms, Observation Forms, Researcher's Diary, and of Session Evaluation Form.	The draft mother education program provides positive contributions to mothers in terms of cooperating with the teacher, communicating better with the child and the teacher, and having their children do homework/revision at home. Participating teachers stated that there were positive changes in the motivation of mothers and children, and that mothers took a more active role and responsibility in their children's education.
25. Özbek & Ergül (2021)	To determine the effectiveness of the multi-component reading comprehension mobile app that improves the reading comprehension performance of students with SLD.	Single-subject experimental designs (Multiple baselines across participants).	Reading Comprehension Performance.	Comprehension strategies mobile app named COSMA.	Four students with SLD who continue to the fourth grade of primary school.	Multiple choice tests and retell procedures.	The COSMA app had a positive effect on the reading comprehension performance of the students. Students' motivation about using the mobile app was high, families and teachers expressed positive opinions about the software, and the application caused an increase in students' reading skills.

Table 1 continued

<i>Study</i>	<i>Aim</i>	<i>RD</i>	<i>DV</i>	<i>IV</i>	<i>P/S</i>	<i>M/T</i>	<i>Results</i>
26. Melekoglu et al. (2021)	To reveal the findings of SOBAT@-II, which was developed to evaluate the development of reading and reading comprehension skills of students with SLD between the ages of 7-14.	Quantitative research design (Survey research method).	-	-	601 students attending primary and secondary school participated in the research.	SOBAT@-II tests.	Oral Reading Skills and Comprehension Test (SOBAT®), which was pre-studied between 2002 and 2012, was expanded to include children between the ages of 7-14, and A and B forms of the test were created.
27. Kırıcı & Melekoglu (2022)	To evaluate the reading fluency and reading comprehension skills of second and third grade students with SLD in terms of different variables and to evaluate their reading levels with the "Fluent Reading and Reading Comprehension Support Education Program" (OKA2 DEP), which is designed to support reading fluency and reading comprehension skills.	Quantitative research (Cross-sectional survey, descriptive survey).	Time to read the whole text, number of correct words read in one minute, percentage of correct reading, number of errors made in the whole text, and reading comprehension scores.	IV	11 students with SLD attending the second and third grades of the primary school participated in the study.	"Fluent Reading and Reading Comprehension Support Education Program (OKA2 DEP)".	The students with SLD were behind their peers in reading fluency and reading comprehension skills, and the error rates of the students decreased as the grade levels of the students increased. The error rate of the students in the first minute is lower than the error rate they make in the whole text, which shows that as the reading continues, the attention of the students gets distracted, their anxiety increases, and therefore the error rates increase as the time lengthens.
28. Yağcıoğlu & Kanlı (2022)	To descriptively examine the theses in terms of years, effective method intervention methods, graduation degrees, and research methods.	Qualitative research (Document analysis).	-	-	53 theses, 12 of which were doctoral and 41 masters, were included in the study.	Data collection form.	The studies reached have increased since 2016, the study group is mostly composed of second and third grade students, quantitative research methods are frequently used in theses, and these are often descriptive studies, and there are limitations in practical studies.
29. Yıldırım-Doğru, et al., (2022)	To examine the relationship between reading fluency levels and attention levels of students with SLD.	Quantitative research methods (Relational scanning model).	Attention performance levels.	Reading fluency levels.	30 students with SLD attending the third, fourth, and fifth grades of primary education participated in the study.	Reading Aloud and Reading Comprehension Test (SOBAT-II), D2 Attention Test, Demographic Information Form.	The reading fluency level of students with SLD is below their age and grade levels. More than half of the students participating in the study had weak attention levels. There was no significant difference between the reading fluency and attention scores of students with SLD, between fluent reading and attention scores of girls and boys according to the duration of reading fluency and support training, and between reading fluency and attention scores according to the participants' family reading activities.

Table 1 continued

Study	Aim	RD	DV	IV	P/S	M/T	Results
30. Grgn & Melekgl (2022)	To develop the reading fluency and reading comprehension skills of the students and to examine the effectiveness of the Reading Fluency and Comprehension Supplemental Education Program (OKA2DEP) of the students with SLD who continue to the second, third, and fourth grades of primary school.	Single subject designs (Changing criterion design).	Number of correct words read per minute, percentage of correct reading, reading comprehension scores.	Reading Fluency and Comprehension Supplemental Education Program (OKA2DEP).	Five students with SLD and attending the second, third, and fourth grades.	Oral reading skills and reading comprehension test (SOBAT) Anadol-Sak intelligence scale (ASIS) SLD symptom checklist parent and teacher forms.	OKA2DEP was effective in reading fluency and reading comprehension of the participants that the participants and their parents were satisfied with the program, but the reading levels of the students were behind their peers with typical development.
31. Yılmaz & Melekgl (2022)	To develop the content of the reading comprehension program for students with SLD attending the second, third, and fourth grades of primary school.	Qualitative Research method (Phenomenological design, semi-structured interviews, observations, assessment tool administration, literature review, and document analysis).	-	-	14 students with SLD and eight students with typically developmental peers, five teachers.	Teacher interview questions, reading texts in Turkish books used in primary school first, second, third, and fourth grades, evaluation of SLD support education program, observation notes.	Students with SLD had difficulties in reading, writing, reading fluency, and reading comprehension, students had low self-confidence and they needed a program to improve their reading comprehension skills. There are expository and narrative texts, and there are gains related to reading comprehension skills in the SLD support education program, but there is no information about teaching and content.
32. Sanur & zmen (2022)	To examine multivariate reading models and the reading comprehension of secondary school students with SLD and comprehensively consider the factors that affect their understanding.	Qualitative Research (Document analysis).	-	-	-	Data collection form.	The main components of reading comprehension models are: (1) reading fluency, (2) prior knowledge, (3) vocabulary, (4) reading comprehension strategies, (5) inference, and (6) motivation. Multivariate studies aim to test the unique effect of each predictor variable on reading comprehension. The results highlight positive contributions in terms of determining the effect of each variable on reading comprehension skills.

Table 1 continued

Study	Aim	RD	DV	IV	P/S	M/T	Results
33. Samur et al. (2022)	To examine to what extent the mediating effect of reading fluency, strategies or prior knowledge changes the relationship between intrinsic motivation and reading comprehension in students with and without SLD.	Quantitative research methods (Multisampling, parallel multiple mediations).	Intrinsic motivation and reading comprehension.	Mediating effects of reading fluency, strategies, or prior knowledge.	226 secondary school students, 113 with SLD and 113 without SLD.	-	The relationship between intrinsic motivation and reading comprehension in students with and without SLD participating in the study was mediated by strategies and prior knowledge, but not by fluent reading. While the direct effects of mediator variables did not differ between groups, the direct effect of intrinsic motivation on reading comprehension skills was found to be insignificant in both groups.
34. Laçın & Çetin (2022)	To determine which reading comprehension practices are used by teachers working with students with SLD in order to develop metacognitive reading strategies for students with SLD.	Quantitative research (Causal, descriptive survey).	Reading Comprehension Skills.	Metacognitive Strategies.	200 teachers (primary school, special education, and Turkish).	The "Metacognitive Reading Strategy Usage Scale" (MRSUS).	The teachers who participated in the research were more successful in using metacognitive strategies in teaching reading skills, and the strategies that teachers use only during reading should be further developed. Teachers taking courses on SLD in their field of study affected their level of use of metacognitive strategies. Teachers working in the upper socioeconomic area were in a better situation in using metacognitive strategies than teachers working in the lower and middle socioeconomic areas. Teachers who take the SLD course are better at applying metacognitive strategies than those who do not take the course. Teachers working in low and medium socioeconomic regions used metacognitive strategies less.
35. Kurnaz & Karamuklu (2022)	To reveal whether the effectiveness of the sound-based sentence method and sentence (analysis) method, which are among the primary literacy teaching methods in students with dyslexia, show a significant difference, and if so, the reasons for the difference, possible results, and solutions.	Single-subject research model (Multiple probe model).	Initial literacy teaching to students with dyslexia.	Sound-based sentence method and sentence (analysis) method.	Six students with dyslexia attending the second and third grades of primary school participated in the study.	Literacy Rating Achievement Test, Family Interview Form, and Literacy Skill Observation Form.	Using the sentence analysis method in teaching primary reading and writing to students with dyslexia is more effective than the sound-based sentence method in reading and writing letters, syllables, words and sentences.

Table 1 continued

<i>Study</i>	<i>Aim</i>	<i>RD</i>	<i>DV</i>	<i>IV</i>	<i>P/S</i>	<i>M/T</i>	<i>Results</i>
36. Arabacı (2022)	To examine the performances of students with SLD in reading fluency and reading comprehension skills by comparing them with the performances of their typically developing peers and to determine the level of relationship between both skills.	Quantitative research model (The relational screening model).	-	-	A total of 55 students, 27 with SLD and 28 with typical development peers attended the fourth grade of primary school.	Reading Fluency Assessment Form, PR prosodic Reading Rubric, Reading Comprehension Assessment Form, Reading Comprehension Assessment Test.	Students with SLD had significantly lower scores in fluent reading and reading comprehension skills than students with typical development. Positive and moderately significant relationship was found between reading speed and reading comprehension in students with SLD, and between prosody and reading comprehension in typically developing students

Note: RD: Research design; DV: Dependent variables; IV: Independent variables; P/S: Participant/Sample; M/T: Materials/Tools

4. Conclusion and Discussion

Research on this subject was conducted once a year until 2018, followed by two, five, six, nine, and ten studies over the following years. Among the topics addressed in the research are diagnosis, evaluation, and teaching processes of SLD in Türkiye. It can be described as a new special needs area. In previous years, individuals continued their educational activities as if it were an intellectual disability. There is an increase in publications related to this field in the national media, studies by the MoNE on the topic, and an increase in academicians with training in this field. These reasons explain why SLD studies have increased in recent years. A recent study by Görgün and Melekoğlu (2019a) found the number of studies on SLD has increased recently in Türkiye.

In terms of the study research design, 18 of the studies were conducted with a quantitative design, 12 with a qualitative design, and six with a single-subject design. On the contrary, Görgün and Melekoğlu (2019a) concluded that 25% of the studies considered within the scope of the study were carried out by survey method. While research is limited until 2022, studies are being conducted that examine experimental, teaching, intervention, and strategy applications, especially in recent years, rather than research that examines the current situation.

The studies use six different dependent variables: reading comprehension in six of them, reading and writing skills in four of them, reading skills alone in four of them, and reading and reading comprehension skills in four of them. Reading skills develop in accordance with all sub-components. The fact that the research is related to the reading comprehension component, which is the last stage of reading, indicates that metacognitive skills are more frequently taught rather than basic reading skills in SLD.

Based on the independent variables, we find that eight of the studies used the method variable, while three studies used the teaching method, teaching strategy, and curriculum teaching variables. Based on the sample sizes and participants for the studies, we can see that seven studies were conducted with primary school students with SLD, six studies were conducted with primary school students with SLD and their peers with typical development, and five studies were conducted with secondary school students with SLD. Considering reading skills are basic skills, mainly teaching them in primary schools is in line with literature studies.

According to the data collection tools used in the studies, eleven of them used tests, six used forms, and four used text and questions. Based on the research results, it can be concluded that the applied teaching, intervention, strategies, and methods have a positive impact on students' ability to read and comprehend. Likewise, Berkeley et al. (2010) concluded in their meta-analysis that reading comprehension instruction is generally very effective and results are high.

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References

- American Psychiatric Association, D., & American Psychiatric Association. (2013). *Diagnostic and statistical manual of mental disorders: DSM-5* (Vol. 5, No. 5). American Psychiatric Association.
- Arabacı, G. (2022). An investigation of the relationship between reading fluency and reading comprehension in students with and without learning disabilities. *Ankara University Faculty of Educational Sciences Journal of Special Education*, 23(2), 365-388. <https://doi.org/10.21565/ozelegitimdergisi.700711>
- Araz-Altay, M., & Görker, I. (2018). Assessment of psychiatric comorbidity and Wisc-r profiles in cases diagnosed with specific learning disorders according to DSM-5 criteria. *Archives of Neuropsychiatry*, 55(2), 127-234. <https://doi.org/10.5152/npa.2017.18123>
- Ateşman, E. (1997). Türkçe'de okunabilirliğin ölçülmesi [Measuring readability in Turkish]. *A.Ü. Tömer Journal of Language*, 58, 171-174.

- Balcı, E. (2019). Examination of fluent reading skill levels of secondary school students with special learning disabilities. *Journal of Education for Life*, 33(2), 262-274. <https://doi.org/10.33308/26674874.2019332120>
- Berkeley, S., Scruggs, T. E., & Mastropieri, M. A. (2010). Reading comprehension instruction for students with learning disabilities, 1995–2006: a meta-analysis. *Remedial and Special Education*, 31(6), 423-436. <https://doi.org/10.1177/0741932509355988>
- Bezirci, B., & Yılmaz, A. E. (2010). *Türkçe için yeni bir okunabilirlik ölçütü önerisi* [Proposal of new criteria for Turkish readability] [Paper presentation]. 18th Congress of Signal Processing and Communication Applications, Dicle University, Diyarbakır.
- Cortiella, C., & Horowitz, S. H. (2014). The state of learning disabilities: Facts, trends, and emerging issues. *National Center for learning disabilities*, 25(3), 2-45.
- Çakıroğlu, O. (2015). Evaluating the readability levels of elementary school textbooks regarding students with learning disabilities. *Elementary Education Online*, 14(2), 671-681. <https://doi.org/10.17051/ie.2015.31984>
- Çakıroğlu, O. (2017). Özel öğrenme güçlüğüne giriş [Introduction to a specific learning disability]. In M. Melekoğlu & U. Sak (Eds.), *Öğrenme güçlüğü ve özel yetenek* [Learning disability and special ability] (pp.1-22). Pegem Akademi. <https://doi.org/10.14527/9786053188049>
- Çakıroğlu, O., Özyurt, Ö., Melekoğlu, M. A., Özyurt, H., Bıyık, M., & Özdemir, C. (2018). Evaluation of teacher and student opinions on using computer software to improve reading performance of students with learning difficulties. *Elementary Education Online*, 17(1), 336-346. <https://doi.org/10.17051/ilkonline.2018.413778>
- Delimehmet-Dada, Ş., & Ergül, C. (2020). Vocabulary and reading comprehension skills of students with learning disabilities and with typical development. *Ankara University Journal of Special Education*, 21(1), 1-22. <https://doi.org/10.21565/ozelegitimdergisi.544840>
- Deniz, S., & Aslan, Y. (2020). Evaluating the effect of story mapping technique on reading comprehension ability of a student with specific learning disability. *Journal of National Education*, 49(228), 241-261.
- Ergül, C. (2012). Evaluation of reading performances of students with reading problems for the risk of learning disabilities. *Educational Sciences in Theory and Practice*, 12(3), 2033-2057.
- Etlan, E. & Acarlar, F. (2021). Relationship between pragmatic language and reading comprehension skills of the students with and without learning difficulties. *Gaziantep University Journal of Educational Sciences*, 5(1), 66-84.
- Fırat, T., & Ergül, C. (2020). The effect of TWA strategy instruction on students with learning disabilities developing cognitive and metacognitive strategies. *Kastamonu Education Journal*, 28(3), 1390-1406. <https://doi.org/10.24106/kefdergi.4025>
- Gökdemir, M. & Yakut, A. D. (2021). Examining reading skills of students with specific learning disabilities. *Journal of Mother Tongue Education*, 9(2), 330-342.
- Görgün, B., & Melekoğlu, M. A. (2019a). Examination of studies in the field of special learning disability in Türkiye. *Sakarya University Journal of Education*, 9(1), 83-106.
- Görgün, B., & Melekoğlu, M. A. (2019b). Developing a reading support program to develop fluent reading and reading comprehension skills of students with special learning disabilities. *Elementary Education Online*, 18(2), 698-713. <https://doi.org/10.17051/ilkonline.2019.562034>
- Görgün, B., & Melekoğlu, M. A. (2022). Effects of reading fluency and comprehension supplemental education program (OKA2DEP) on reading skills of students with specific learning disabilities. *Reading & Writing Quarterly*, 38(4), 297-322. <https://doi.org/10.1080/10573569.2021.1954568>
- Grigorenko, E. L., Compton, D. L., Fuchs, L. S., Wagner, R. K., Willcutt, E. G., & Fletcher, J. M. (2020). Understanding, educating, and supporting children with specific learning disabilities: 50 years of science and practice. *The American psychologist*, 75(1), 37-51. <https://doi.org/10.1037/amp0000452>
- Gündoğdu, S., Güldenoğlu, B., & Kargın, T. (2021). A comparison of the reading comprehension skills of students with and without learning disabilities in a linguistic perspective. *Turkish Journal of Special Education Research and Practice*, 2(1), 1-26. <https://doi.org/10.37233/TRSPED.2020.0106>
- Individuals with Disabilities Education Act of (2004), 2006, 20 U.S.C. 1400 et seq. (statute), 34 C.F.R. § 300 (regulations) published in the Federal Register on August 14, 2006.
- İlker, Ö., & Melekoğlu, M. A. (2017). Review of the studies on writing skills of students with specific learning disabilities in elementary education. *Ankara University Journal of Special Education*, 18(3), 443-469. <https://doi.org/10.21565/ozelegitimdergisi.318602>
- Karasar, N. (2017). *Bilimsel araştırma yöntemi: kavramlar, ilkeler, teknikler* [Scientific research method: concepts, principles, techniques]. Nobel Pub.

- Kayahan-Yüksel, D., & Emmioğlu-Sarıkaya, E. (2021). Mother's participation in literacy education of children with special learning disability: A draft training program, *E-International Journal of Educational Research*, 12(5), 36-64 <https://doi.org/10.19160/e-ijer.999351>
- Kazan, G., & Gökbulut, B. (2021). Determining the level of screen and paper reading for students with learning difficulties. *International Journal of Karamanoğlu Mehmetbey Educational Research*, 3(1), 27-34. <https://doi.org/10.47770/ukmead.903654>
- Kılıç-Tülü, B. K., Özbek, A. B., & Ergül, C. (2021). Effectiveness of TWA strategy instruction on reading comprehension performances of students with learning disabilities. *Dokuz Eylül University Journal of Education*, (51), 97-118.
- Kırıcı, E., & Melekoğlu, M. (2022). Evaluation of reading skills of students with specific learning disabilities with OKA2DEP. *Journal of National Education*, 51(236), 2830-2850. <https://doi.org/10.37669/milliegitim.983749>
- Kumaş, Ö. A., Dada, Ş. D., & Yıkmaş, A. (2019). The relationship between verbal problem solving and reading comprehension skills of student with and with-out learning disabilities. *Mersin University Journal of Education*, 15(2), 542-554. <https://doi.org/10.17860/mersinefd.474803>
- Kurnaz, A., & Karamuklu, E. S. (2022). Sentence analysis and sound-based sentence methods in students with dyslexia comparison of the effectiveness of primary reading and writing teaching. *Journal of National Education*, 51(236), 2871-2902. <https://doi.org/10.37669/milliegitim.1051668>
- Laçın, E. & Çetin, E. (2022). An examination of teachers' use of metacognitive strategies in supporting the reading comprehension skills of children with learning disabilities. *International Journal of Contemporary Educational Research*, 9(3), 519-531. <https://doi.org/10.33200/ijcer.1091661>
- Melekoğlu, M. A., Erden, G., & Çakıroğlu, O. (2021). Oral reading skills and comprehension test-II (SOBAT®-II): Assessment of reading fluency and comprehension of Turkish students with specific learning disabilities. *South African Journal of Education*, 41(1), 1880. <https://doi.org/10.15700/saje.v41n1a1880>
- Melekoğlu, M. A., Erden, H. G., & Çakıroğlu, O. (2019). Development of the oral reading skills and comprehension test-II (Sobat®-II) for assessment of Turkish children with specific learning disabilities: Pilot study results. *Journal of Educational Issues*, 5(2), 135-149. <https://doi.org/10.5296/jei.v5i2.15379>
- Ministry of National Education [MoNE]. (2006). *Özel eğitim hizmetleri yönetmeliği* [Regulations on special education services]. Official Newspaper.
- Özbek, A. B., & Ergül, C. (2021). Effectiveness of comprehension strategies mobile app (COSMA) on reading comprehension performances of students with learning disabilities. *Journal of Special Education Technology*, 37(2), 297-309. <https://doi.org/10.1177/01626434211013540>
- Özkubat, U., Karabulut, A., & Sert, C. (2022). Math problem solving interventions for middle school students with learning disabilities: A comprehensive literature review. *Ankara University Journal of Special Education*, 23(1), 191-218. <https://doi.org/10.21565/ozelegitimdergisi.774650>
- Özmen, R. G. (2005). Comparisons of the reading speeds of the students with learning difficulties through texts. *Education and Science*, 30(136), 25-30.
- Pürsün, T., & Sarı, H. (2019). Investigation of studies on reading comprehension skills of students with specific learning difficulties. *Turkish Special Education Journal*, 2(1), 37-60.
- Reschly, D. J. (2014). Response to intervention and the identification of specific learning disabilities. *Topics in Language Disorders*, 34(1), 39-58. <https://doi.org/10.1097/tld.0000000000000003>
- Sanır, H. & Özmen, E. R. (2022). Multi-component models of reading comprehension: important factors in reading comprehension for students with learning disabilities. *International Journal of Education Technology and Scientific Researches*, 7(19), 1983-2026. <https://doi.org/10.35826/ijetsar.525>
- Sanır, H., Özmen, E. R. & Özer, A. (2022). The mediating effects of reading fluency, comprehension strategies, and prior knowledge on the relationship between intrinsic motivation and reading comprehension. *Current Psychology*, 42, 19009, 19024. <https://doi.org/10.1007/s12144-022-03084-0>
- Seçkin-Yılmaz, Ö. Ü. Ş., & Büyükçakmak, Y. (2020). Investigating word reading and phonological processing skills of students with and without learning disabilities. *Kalem International Journal of Education and Human Sciences*, 10(2), 365-391, <https://doi.org/10.23863/kalem.2020.161>
- Seçkin-Yılmaz, Ş., & Yaşaroğlu, H. (2020). Investigating of reading, vocabulary knowledge and verbal memory performances of students with learning disabilities. *Journal of Faculty of Educational Sciences*, 53(2), 751-780. <https://doi.org/10.30964/auebfd.588849>

- Silver, C. H., Ruff, R. M., Iverson, G. L., Barth, J. T., Broshek, D. K., Bush, S. S., Sandra, P. K. & Reynolds, C. R. (2008). Learning disabilities: The need for neuropsychological evaluation. *Archives of Clinical Neuropsychology*, 23(2), 217-219. <https://doi.org/10.1016/j.acn.2007.09.006>
- Sümer-Dodur, H. M. (2021). A comparison of the morphological awareness skills of students with and without specific learning disabilities. *Journal of Education, Science and Research*, 2(2), 157-170.
- Şahin, F., & Çakır, R. (2018). Effects of multimedia materials on reading-writing skills of the students who have problems about reading and writing. *Journal of Instructional Technologies and Teacher Education*, 7(2), 75-90.
- Uçar-Rasmussen, & M., Cora-İnce, N. (2017). The effectiveness of the think aloud method in the teaching of strategies metacognitive reading comprehension to individuals with learning difficulties. *Abant İzzet Baysal University Journal of Faculty of Education*, 17(4), 2180-2201. <https://doi.org/10.17240/aibuefd.2017.17.32772-364006>
- Yağcıoğlu, Ö., & Kanlı, Ö. Ü. E. (2022). *Examining the theses made in Türkiye on the reading skills of students with special learning disabilities* [Paper presentation]. IXth International Eurasian Educational Research Congress, Ege University, İzmir.
- Yıldırım-Doğru, S. S., Topaloğlu, G., Aydın, A., Özkut, Ç., & Yurdabakan, İ. (2022). Primary school with special learning disabilities 3-4-5. reading aloud in grade students the relationship between ability and attention performance level. *The Journal of International Education Science*, 9(30), 327-349. <https://doi.org/10.29228/INESJOURNAL.54933>
- Yıldız, M. & Melekoğlu, M. A. (2020). Investigation of studies on reading comprehension skills of individuals with specific learning disabilities. *Inonu University Journal of the Faculty of Education*, 21(3), 1274-1303. <https://doi.org/10.17679/inuefd.770066>
- Yıldız, S. (2004). Psychosocial characteristics, problems and education of children with learning disabilities. *HAYEF Journal of Education*, 1(2), 169-180.
- Yılmaz, E., & Melekoğlu, M. A. (2022). Developing a reading comprehension support program for primary school students with specific learning disabilities. *International Journal of Progressive Education*, 18(4), 75-89. <https://doi.org/10.29329/ijpe.2022.459.6>