

Improving Reading and Writing Literacy in I Cycle of Primary Education in Montenegro

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Received: March 9, 2021

Accepted: May 19, 2021

Online Published: May 30, 2021

doi:10.11114/ijce.v4i2.5250

URL: <https://doi.org/10.11114/ijce.v4i2.5250>

Abstract

The aim of this research is to examine didactic/pedagogical issues and teaching/learning strategies by determining the characteristics of pre-literary skills in the I grade, reading skills in the II grade and reading and writing skills in the III grade, as well as to which difficulties teachers are encountered in the literacy process itself. We observed primary public school pupils - 136 in I and 136 in II grades and 400 in III grades from Podgorica, Mojkovac, Budva and Nikšić. The number of examined teachers from the same schools is 83. It was noticed that a significant number of I grade pupils did not have functional linking of symbols, has difficulties in understanding the words structures. Pupils in the II grade do not make a distinction in hand written and hand printed letters and have difficulties with punctuation. There are difficulties in general understanding and the simultaneous processing of information; the existence of elements of dyslexia and dysgraphia was observed. Among pupils in III grades there is uncertainty in writing, insufficient knowledge of fine graphomotorics, each 10th child has a difficulty in reading and understand what was read, around 13% has a difficulty in writing down what was read, and about 22% of them has a reduced skill to write a story based on the picture. The study findings show a need to redefine teaching goals, increase the number of hours for acquiring pre-school skills, teaching languages and teaching literature, propose more clearly the activities of adopting pre and general literacy skills, earlier learning of the Latin letters, to modernize teaching, and have a team approach.

Keywords: literacy, reading skills, writing skills

1. Introduction

For many cultures, reading and writing are skills which are the base of education. In Montenegro the literacy process systematically begins by enrolling in school at the age of 6, it develops and lasts during a lifetime of an individual.

Primary education in Montenegro is carried out according to the provisions of the General Law on education¹ and the Law on primary education². Nine-year primary school education is compulsory, free of charge and carried out in three cycles (3+3+3 grades are a part of cycles) for children from 6 to 15 years. In the first grade, the teaching processes are jointly led by the class teacher and the preschool teachers. In the second and third grade of primary school, all classes in all subjects are conducted by the class teacher. School marks are descriptive - students' achievements are not numerically expressed, but the style of learning, interaction and the level of outcomes are presented.

It is important to mention that after each cycle: at the end of III grade, VI grade and IX grade an assessment of pupils' knowledge is conducted in order to determine the quality of the education system. In the III grade it is conducted on the internal base (within the school), in the VI grade it is a combination of the internal and external assessment (tests

¹ <https://mpnks.gov.me/biblioteka/zakoni> - "Official Gazette of Montenegro", no. 64/02, 31/05, 49/07, "Official Gazette of Montenegro", no. 04/08, 21/09, 45/10, 45/11, 37/13, 47/17

² <https://mpnks.gov.me/biblioteka/zakoni> - "Official Gazette of Montenegro", no. 64/02, 49/07, "Official Gazette of Montenegro", no. 45/10, 37/13, 47/17

prepared in cooperation of the teachers and Examination centre), in the IX grade it is an external assessment conducted by the Examination centre, as a national institution established for this and similar purposes.

In 2007, the Bureau for educational services (BES) published a material "Guidepost", based on the research of a sample of 298 pupils of the II grade, and it assessed the following areas: phonological, ability to read and write. The results indicate that 6% of the tested population has difficulty in mastering the reading and writing skills.

After this, in 2010, BES and the Examination center conducted an analysis of the pupils' results on the schools' level assessments and results of the external assessment in the end of the II cycle, which was conducted for the subject *Montenegrin language and literature*. Findings that followed the expected outcomes proposed in the national curriculum indicate that pupils do not focus enough on the task requirements, they give incomplete answers to specific and clearly asked questions, ignore the spelling and grammar, do not differentiate words by origin, neither to which literary genre the text belongs, do not recognize the types of words, antonyms and synonyms (Marić at all., 2011).

After the conducted MISC³⁴ research (UNICEF, 2013) the focus groups were organized with the aim to further acquire data and information for certain topics. Regarding the index of development in early childhood as an MICS indicator, and literacy and knowledge as its part, the focus groups gave few recommendations: learning through the play, mastering the content related to symbols, using printed material for the most frequent words from everyday life and communication, professional development of preschool and elementary school teachers; development of didactic materials for learning the letters and numbers and creating and realizing the methodologies for acquiring key competencies and applicable knowledge.

2. Study Description

2.1 Problem, Aim

The results of PISA⁴ testing from 2012 has been oriented to the reading performance, measures the capacity to understand, use and reflect on written texts in order to achieve goals, develop knowledge and potential, and participate in society. PISA 2021 indicate the average achievements of Montenegrin pupils in reading literacy: 2006 – 392 points, 2009 – 408 points, and 2012 – 422 points. The average achievement in the area of scientific literacy is 410 points, and the results indicate that no progress has been made in the field of scientific literacy, which is in direct relation to the reading literacy (Ministry of Education, 2014). In the PISA 2015 - 5665 fifteen-year-olds from 49 secondary schools and 15 primary schools from Montenegro participated: 32.18% students from high schools, 61.47% from four-year vocational schools, 5.1% from three-year vocational schools and 1.24% from primary schools. By ranking countries according to the average result in reading literacy, Montenegro is in 48th place with 427 points. The average achievement in mathematical literacy in Montenegro on the PISA 2015 test is 418, which is 72 points lower than the 500 that are OECD average⁵ (Paljević and others, 2015). It has put Montenegrin pupils in Level 2. It means that pupils on this level can identify the main idea in a piece of text of moderate length. They can understand relationships or construe meaning within a limited part of the text when the information is not prominent by producing basic inferences, and/or when the text(s) include some distracting information. They can select and access a page in a set based on explicit though sometimes complex prompts, and locate one or more pieces of information based on multiple, partly implicit criteria. Readers at Level 2 can, when explicitly cued, reflect on the overall purpose, or on the purpose of specific details, in texts of moderate length. They can reflect on simple visual or typographical features. They can compare claims and evaluate the reasons supporting them based on short, explicit statements. Tasks at Level 2 may involve comparisons or contrasts based on a single feature in the text. Besides, 80% of pupils did not manage to solve tasks of medium difficulty. PISA 2018 results shows that Montenegrin pupils has average achievement in reading skills 421, that is still lower than the average, which are around 480 points (Examination centre, 2019).

Problem - Based on the abovementioned, the study problem could be defined as: determine which characteristics of reading competences have I cycle primary school pupils and how it is influenced by the teaching approach.

The objective of the study is to determine the characteristics of pre-literary skills in the I grade (age 6), reading skills in the II grade (age 7) and writing skills in the III grade (age 8); which difficulties the teachers encounter in the literacy

³ Multiple Indicator Cluster Survey

⁴ PISA is the OECD's Programme for International Student Assessment. PISA measures 15-year-olds' ability to use their reading, mathematics and science knowledge and skills to meet real-life challenges

⁵ Level 6 Above 698.32 score points Level 5 From 625.61 to less than 698.32 score points Level 4 From 552.89 to less than 625.61 score points Level 3 From 480.18 to less than 552.89 score points Level 2 From 407.47 to less than 480.18 score points Level 1a From 334.75 to less than 407.47 score points Level 1b From 262.04 to less than 334.75 score points Level 1c From 189.33 to less than 262.04 score points Below level 1c Less than 189.33 score points

skills developmental process of pupils and achievements on the internal-external knowledge test.

The aim is to describe the current level of children's and pupils' pre-skills, as well as needed skills for the future overall literacy and reading and writing competences. Besides, it aims to investigate with teachers the current teaching approach, school environment, curriculum expected outcomes to create a general overview of pupils' needs, practice, teaching methods, and to offer instructions and recommendations for the improvement of the teaching process.

The tasks of the study was to:

- Examine the so-called pre-literacy skills of pupils in the first grade of primary school
- Determine reading characteristics of pupils in the II grade of primary school
- Determine reading and writing characteristics of pupils in the III grade of primary school, presence of elements of dyslexia and dysgraphia
- Examine the teaching approach and teachers' competences related to pupils results in reading and writing
- Examine in which way it is recommended to improve the teaching process in order to make better pupils reading and writing outcomes.

2.2 Hypotheses

We set up four hypothesis:

H1 - We assumed that I grade of primary school pupils have not established sufficient pre-literary skills as a precondition for the reading and writing competences.

H 2 – We assumed that II grade pupils have issues in reading skills: understanding, recognition, processing of words, sentences.

H 3 – We assumed that pupils have issues in writing and reading comprehension in III grade: elaborating, fine graphomotrics, and undifferentiated use of printed and written letters.

H 4 – We assumed that pupils in significant percent show the existence of elements of dyslexia and dysgraphia.

H 5 – We assumed that teachers approach is influenced by curriculum obstacles, lessons organisation, insufficient support and instruction for work.

3. Method

3.1 Literature Review

For this study we have conducted the literature review with the idea to make connection with school context, pupils' needs, to further develop methodology, better describe instruments, define and find sample. In literature we confirm that particular skills have to be developed in the first grades of primary school (Bloom and Lahey 1978).

To find in which direction we need to go in this study and research we use some similar or relevant researches in concrete area, we did literature review. Also its helped us to describe pupils' outcomes and expected characteristics (But and Svorc 2009).

In this direction, we started with the national framework, as well as practice and found that in Montenegro there is no relevant researches or orientation to pupils' and teaching process needs. Also, that in the area of inclusive education there is no sufficient concrete researches (mostly oriented to the inclusive attitudes nor to the inclusive practice). We found a satisfactory number of prepared material, but without evidence base – its' posted on the following portal: <http://www.skolskiportal.edu.me/Pages/Inkluzivnoobrazovanje.aspx>

In the region, there is more orientation to attitudes, prevalence than to the phenomenon itself.

However, Bulut (2016) researches in the paper "Early detection of dyslexia in school", and emphasizes the education of staff, adaptation of teaching materials, ways of reading and monitoring the work of students with dyslexia, but also adaptation of materials and communication between parents and school system.

Forlin (1998) in the Survey of Teachers' Personal Concerns about Inclusion of Children with Disabilities in Regular Classrooms, indicates that there has been an increase in the degree of anxiety of regular teachers and special education indicates the attitude towards their own competencies for inclusive practice. They point to the need to expand basic and gain additional knowledge and support for the application of new methods to include and improve the effectiveness of inclusive practices.

In the Research Factors influencing the attitude of primary school teachers towards inclusive education, concluding that inclusive education today is in itself mandatory. It is becoming a key area in the education system and therefore requires more attention. (Chopra, 2008).

3.2 Instruments

First of all, an examination of the characteristics of children in the I cycle of the primary education was carried out and it implied to: detection and description of the characteristics of pre-literary skills in I grade, reading skills in II grade, writing and reading comprehension in III grade (Jeličić at al 2016).

It was necessary to do two types of assesment instruments, because of the fact that children in the I grade of primary school still do not have writing skills, so for them is necessary to design visual material, or conduct oral examination. Material from the „Guidepost” are used as an instrument.

Because of this, an instrument for the evaluation of pupils in the I grade of primary school has been given individually. Children were asked and provided oral answers - image-based naming. Accordingly, instrument for pupils in the II and III grade of primary school were given in groups, because they can read and provide written answers. That means that tests were conducted in written form.

Instrument for the evaluation of the pupils in the I grade from the sample primary school was considered: the quality of the syllables - it points to the difficulty of connecting voices to syllables; Naming the first voice in the word - indicates structural errors - not recognizing the voice as a whole and does not define the way expected but acting as if they are heard as unified ones; Recognition of voices in words - their number reflects the feeling that words consist of voices, that is, points to the skill of splitting words into voices; Naming the last voice in the word - indicates to structural errors, which speaks of the difficulty of experiencing the word in entirety.

Instrument for the assessment of II and III grade from sample primary school pupils has a written form. It was conducted by researchers administered during the regular school classes and oriented to the concrete skills. During the group assignment of the instrument for the pupils in the second grade, it was organized in a way to complete the sentence based on pictures, then to answer on questions after they look at picture. For the third grade, pupils also were given pictures and based on them the pupil's ability to read and understand what was read, write down what was read and write a short story based on the observed, was assessed. The aim was to detect and describe the characteristics of writing and reading comprehension.

The following texts were selected from the „Guidepost”: The Stork in order to determine the level of reading and understanding of the short story. A group test based on the text The Stork was designed for II grade pupils. It was chosen because it allows to observe the following: ability to read a short word, understand what was read, write down with comprehension what was read, the ability to predict and the like.

Among III grade pupils through the instrument the following was observed: the ability of pupils to read and comprehend what was read, write down what was read and write a short story based on given images. The requirements referred to: the title, characters of the story, connection of sentences (thoughts), clear statement of thoughts, the way in which a pupil understands a sentence, how he develops and follows the course of the story. We used a short story Stork and the following questions were asked based on the text: 1. where do certain birds fly of? 2. Who did not fly to the south with its flock? 3. Why the stork didn't fly to the south? 4. Where did the stork spend the winter? 5. Who took care of the stork? 6. What is storks' favourite food? 7. Where do storks make their nests? 8. When does its flock arrive? (Marić&Ketonen, 2007).

Table 1. The Stork

Text: The Stork	Questions
In autumn certain birds fly to the south. They're warming up there. One stork did not go to the south with its flock. She is old and has no power to fly so far. Bato took the stork and put it in the barn. It's warm in the barn. He kept it and fed it. Sometimes Bato would catch a frog. This was a true feast for the stork. Whenever there was a good weather, the stork would come out of the barn and fly in the yard. On the roof of Bato's house, she made a nest. Storks make nests on the roofs of houses. So this is how our stork survived a cold winter. In the spring the stork will arrive her flock.	<ol style="list-style-type: none"> 1. Where do certain birds fly of? 2. Who did not fly to the south with its flock? 3. Why the stork didn't fly to the south? 4. Where did the stork spend the winter? 5. Who took care of the stork? 6. What is storks' favourite food? 7. Where do storks make their nests? 8. When does its flock arrive?

Then we did an analysis of the pupils' results achieved during the internal – external knowledge assessment. We selected the task based on the text “A beautiful carnation” designed for the assessment of the specific skills such as reading and writing competences (understanding, creating). We chose these because it allows to determine how they adopted grammar rules, whether they learned to read and write, whether they write correctly, whether they read with understanding. It is not too demanding, but has enough complexity to reach the abovementioned.

Table 2. A beautiful carnation

Text: A beautiful carnation	Questions and tasks
<p>Once upon a time there lived a king and a queen who had a son. He had the power to turn into reality all that he had imagined. “When the baby is left by himself”, said the court cook, “I’ll take him away, far away.”</p> <p>- Boy - said the cook when the prince grew up - I want a luxurious palace with a lot of rooms and treasures. It would be nice to wish for a friend of your age who would accompany you.</p> <p>The boy repeated out loud the desire of the cook and the cottage transformed into a luxurious palace, and he got a friend with whom he immediately started playing.</p> <p>One day a bird flew on boy’s shoulder and it told him who he is and how he got there.</p> <p>The prince asked his friend: I want to go back home. Do you want to come with me?</p> <p>- No, I don’t know what to do in a palace where I do not know anyone – she replied.</p> <p>The prince transformed her into a carnation and took it with him. He turned the cook into a stray dog. Having arrived home, the prince introduced himself to the king, his father, and told him how he learned the truth. He turned the carnation into a girl again. After a few years the prince and his beautiful, now grown friend, got married, and they invited bunnies and birds to their wedding.</p>	<p>1. Which title would still match the text you have read? 1.1 The stray dog. 1.2. Bunnies and birds. 1.3. Prince’s power;</p> <p>2. A) Who took the boy to the forest? B) Why did he do that?</p> <p>3. From whom the boy learned that he was a prince? 3.1. From his friend. 3.2. From the cook. 3.3. From the bird. 3.;</p> <p>4. What happened to prince’s friend at the end of the story? 4.1. She was left to live in a cottage. 4.2. The prince turned her into a flower. 4.3. She became a princess.</p> <p>5. Write down a colon and commas where necessary: Wolves, deer, foxes, rabbits and other animals lived in the forest;</p> <p>6. Carefully read the text. Finish the story with three to five sentences.</p>

Then, a questionnaire for the teachers was prepared and handed to teachers through which we wanted to get information about what difficulties teachers face during the pupils' literacy process, in which teachers are tasked with teaching pupils to read and write. The questions are arranged according to the areas: characteristics of pupils, achievability of the goals of the subject program, application of didactic means, recommendations in relation to the methods of work, etc. Some questions were answered by estimating the number of pupils to whom a characteristic refers; some were answered by choosing the degree of agreement, ranges from completely agree to strongly disagree, some questions are answered with YES / NO; to some they freely wrote down answers (suggestions, recommendations). The questions were related to: what number of pupils divides words into syllables, recognizes the first voice in a word, recognizes the voice at the end of a word, divide words into sounds. Then, how much they write and read with understanding, how many pupils are able to read, write, understand what is read and write a short story based on pictures, compared at the beginning and end of the school year. Then, through a five-point scale: from completely agree to completely disagree, assessing how the objectives are set in the subject program, defined activities, content, concepts, number of hours provided for implementation.

All of the abovementioned means that, assessment, suggestions and recommendations would be given by the teachers themselves.

3.3 Sample

Five pilot schools for the implementation of the study and further application of the newly defined methodology were selected. The idea was to have equal representation of three Montenegrin regions: north, central including Capital and south. These were the primary schools: „Maksim Gorki“, Podgorica, „Milan Vukotić“, Golubovci, „Aleksa Đilas Bećo“, Mojkovac, „Stefan Mitrov Ljubiša“, Budva, „Ivan Vušović“ Nikšić. The criteria was to have each region equally represented, as well as to have both urban and suburban schools, from larger and smaller areas.

In each of the 5 schools, according to the principle of random cause, one class of each I, II, and III grade was selected and the pupils were tested: individually and in group, as previously described.

The total number of pupils – observed children - in I grade of primary school is 136. 136 children were observed in II grade.

The instrument for children in the III grade was given in groups, and it gathered 400 pupils. All pupils present in the class were included, and parents agreed for the assessment, because their children's basic skills were being estimated.

The number of surveyed teachers is 83, and we included all teachers from the sample of schools that implement the teaching process.

3.4 Data Gathering and Processing

During the processing of data obtained by the research, we used basic descriptive and statistics conclusions. Moreover, programs for qualitative data analysis and basic descriptive inference statistics were used. ATLAS.ti version 8.2. Computer program for systematization and coding of the obtained results (Friese, (2012), in order to provide evidence, reduce the risk of subjective interpretation of these data, and ensure and strengthen the significance and reliability of the findings.

4. Results

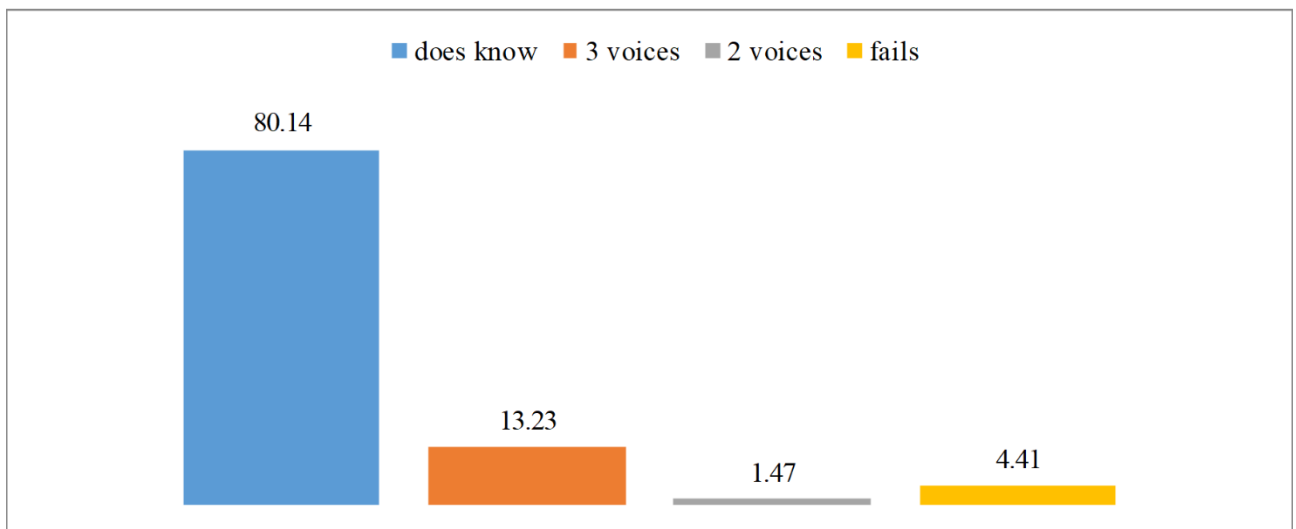
The results presented in the text are organized and arranged based on the instruments and study sample: I grade pupils, II grade pupils, III grade pupils and questionnaires for the teachers.

Also, it follows study tasks and hypotheses.

4.1 Determining the Characteristics of Pre-literary Skills in the I Grade

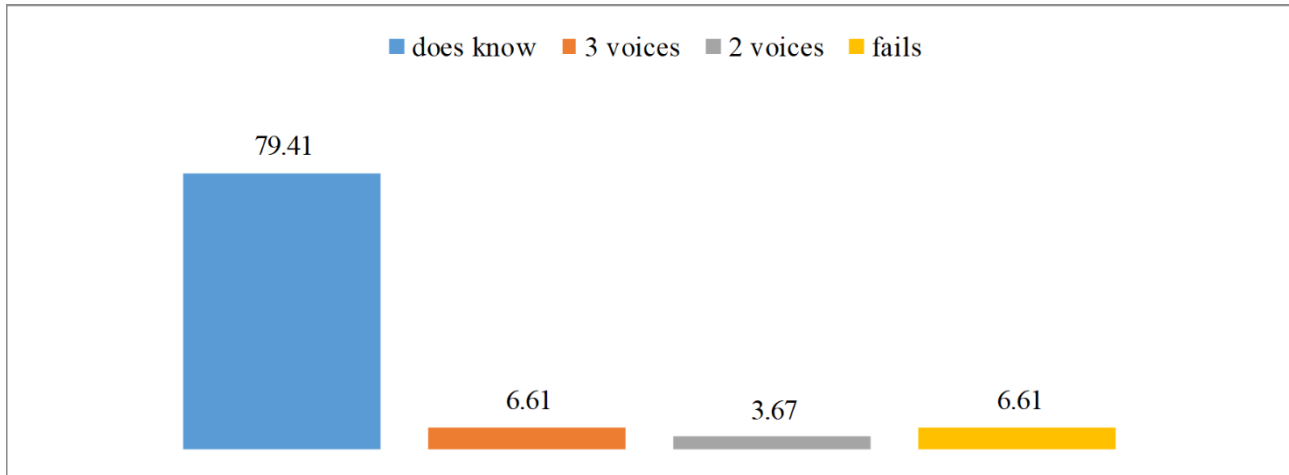
Our first tasks was to examine the so-called pre-literacy skills of pupils in the first grade of primary school. The assessment of I grade pupils of primary school included: Naming the first voice in the word; Recognition of voices in words; Naming the last voice in the word.

The result for I grade pupils indicate that 17, 64% of children know, and 82, 36% does not know how to split syllables. A significant number of pupils still does not understand the concept of connecting voices to syllables, which suggests that no early mastering of the functional connection of the symbol is applied. Furthermore, 98.52% of them does know how to name the first voice. When it comes to spelling, 4.41% of children fail to spell. We find that most pupils recognize voices in words, but there is a negligible number of those who have difficulties understanding that the words consist of voices - almost 20% (Figures 1).



Figures 1. Results in spelling

In addition, a significant number of I grade pupils does recognize isolated symbols, but 20% of them have structural difficulties in understanding the word as a whole (Figures 2).



Figures 2. Results last syllable

4.2 Determining the Characteristics of Reading Skills in the II Grade

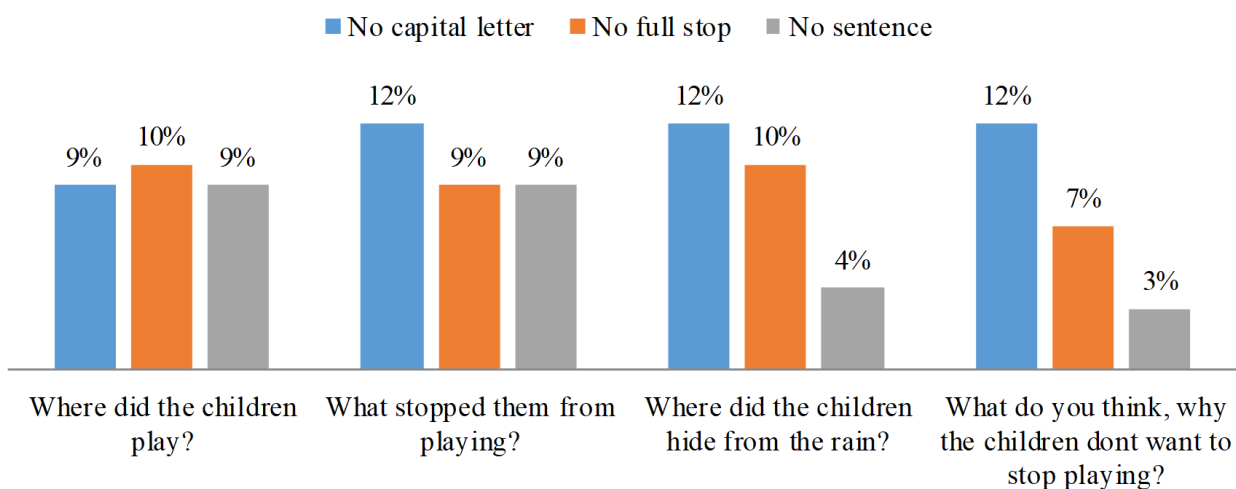
Our second tasks was to determine reading characteristics of pupils in the II grade of primary school. The assessment of II grade pupils of primary school included: ability to read a short word, understand what was read, write down with comprehension what was read, the ability to predict and the like.

II grade pupils still do not differentiate printed (51%) and written letters (49%). In a task that requires filling in words, 41.91% - 49.26% of pupils didn't write the capital letter at the beginning of the sentence, 14.70% did not write a full stop at the end of the sentence.

For a task, with the aim to determine the level of reading and understanding short stories, the researchers read the following story to the children: The children are playing in the park. It's starting to rain. The kids don't want to go home. They hide under the leaves of the tree. When the rain stops, they will continue to play. After this, children had a task to answer the following questions: *Where did the children play? What stopped them from playing? Where did the children hide from the rain? What do you think, why the children do not want to stop playing?*

The children had to respond in writing. Results show that the level of success of the answer to question number 1 is from 66.66% in one school to 100% in two schools. The answer to the second question ranges from 50% to 83.33% of pupils. For the third question, the correct answer ranges from 19.23% to 54.17% pupils, and to the fourth question 21.87% up to 56.66% of pupils. These results are shown in Figures 3. This tells us how they respect the grammatical rules; understand the text; process the information.

Certain indicators that can point to the presence of elements of dyslexia and dysgraphia were found: errors of linking words in a sentence, incorrect punctuation, etc. (Ćoso, 2016).



Figures 3. Capital letter, punctuation, sentence

4.3 Determining the Characteristics of Reading Skills in the III Grade

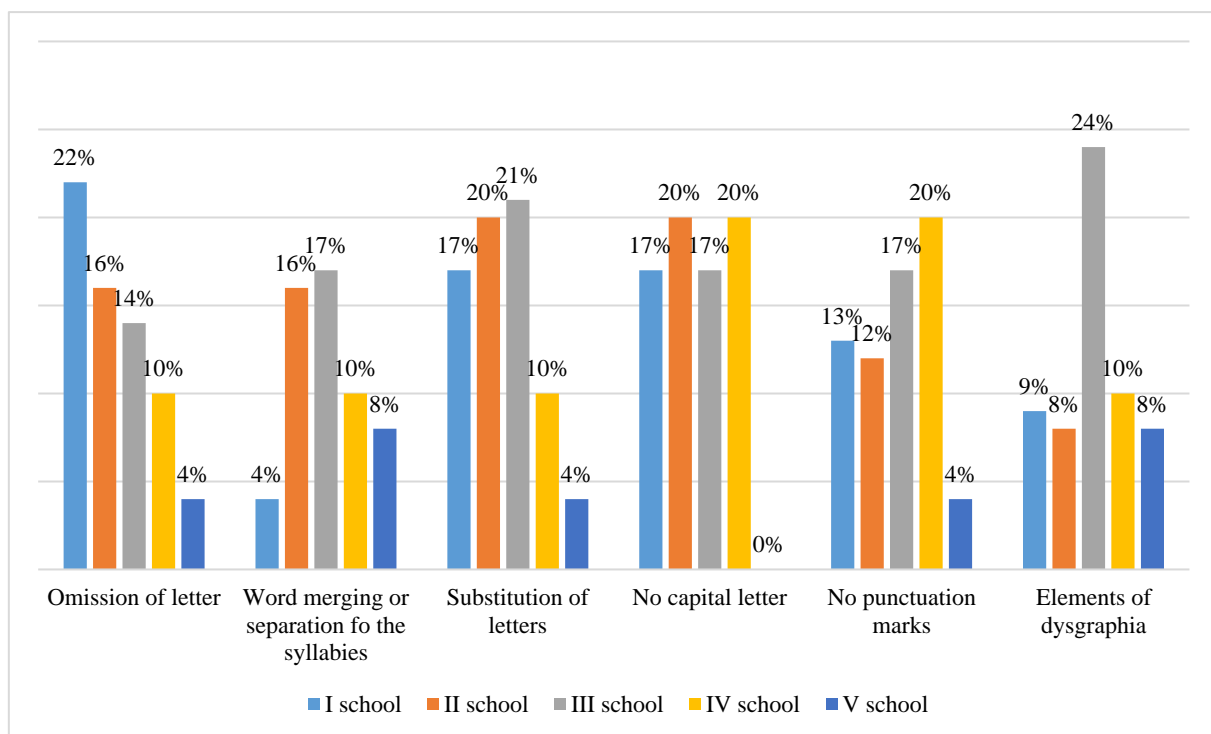
Our third task was to determine reading and writing characteristics of pupils in the III grade of primary school, presence of elements of dyslexia and dysgraphia. Regarding this, we assessed: the ability of pupils to read and comprehend what was read, write down what was read and write a short story based on given images.

48% - 82.60% of pupils from III grade have a skill to connect the sentence. 21% - 40% of pupils wrote a clear story, while 5% to 10 % does not follow the request and completely reverse the task in a way that they mix the letters, write them upside down, etc.

Pupils wrote 4 to 6 sentences for a 4 image story: 1 sentence in the introduction, 2 for the main body and 1 for the conclusion; 43% of pupils wrote only 1 sentence (1 image, 1 sentence), 30% - 40% of pupils introduced the reader to the further course of the story, while 16, 66% - 34, 78% pointed to the action in the story.

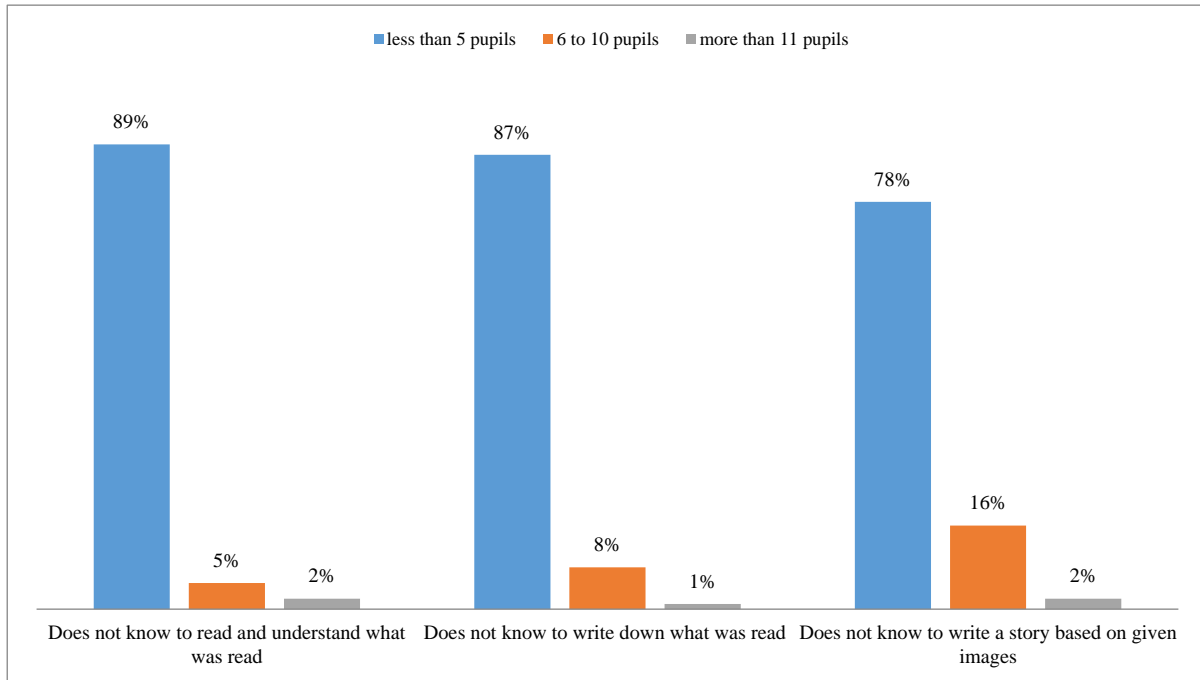
Difficulties in reading and writing were perceived, which are visible in the omission of letters, the presence of word merging or separation to syllables, and the substitution of letters. Difficulties have also been observed in the clarity of writing, insecurity in writing, inadequate mastering with fine graph motoric, and indecision in writing in the series.

While revising the children’s responses, the researchers compared them with grammar rules and found the lack of expected application of grammatical rules: the use of capital letters, punctuation marks, and the uneven use of printed and written letters. Figures 4 shows characteristics of pupils’ language skills in the III grade of primary school.



Figures 4. Language skills

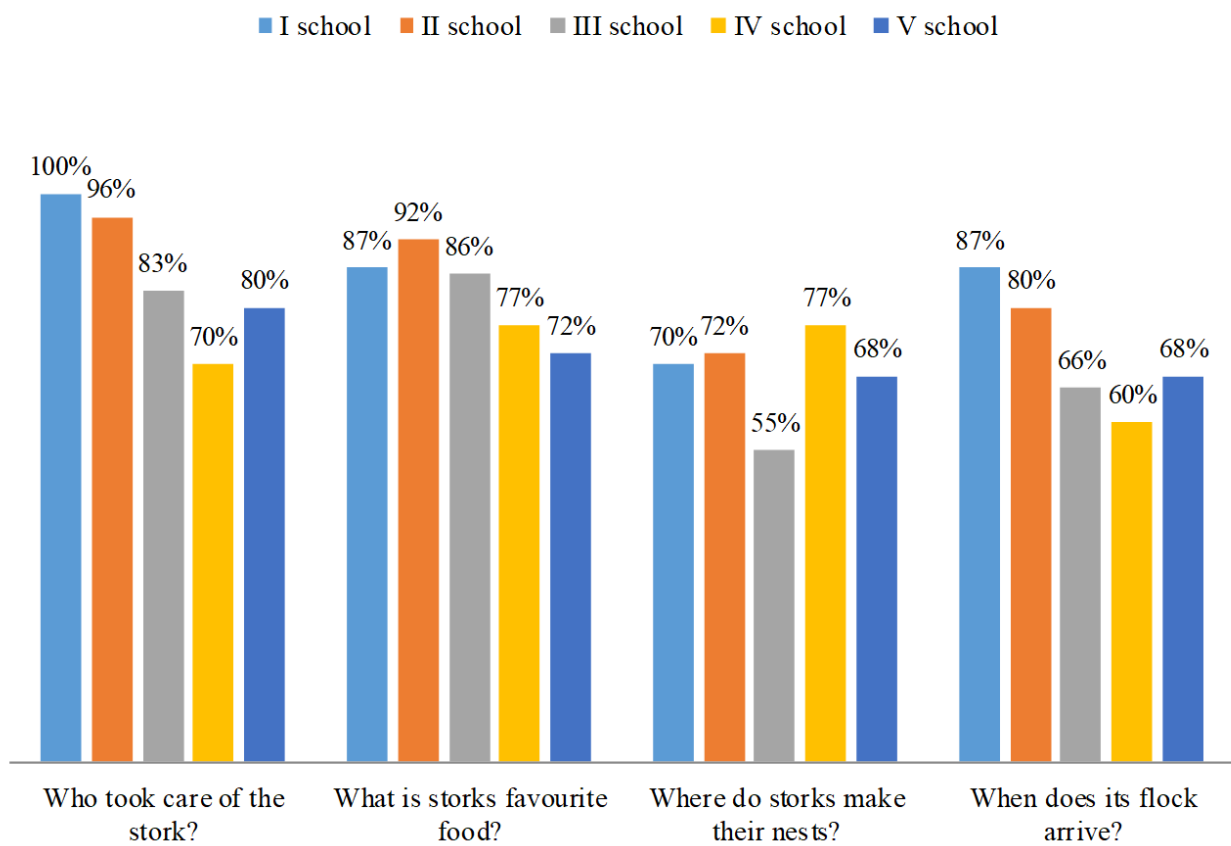
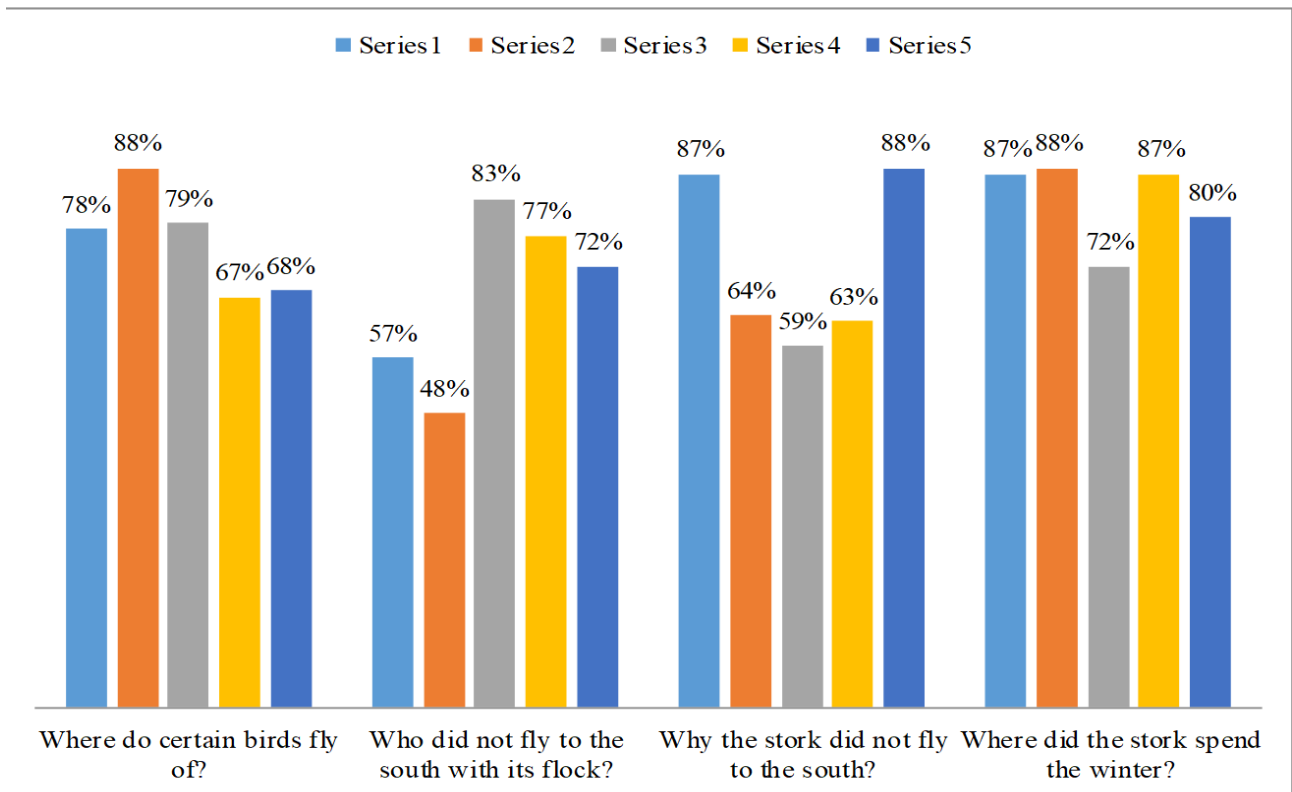
The following Figures 5 presents the elements of writing and reading comprehension, observed in relation to pupils’ skills to read, understand, write down what was read and write a short story based on given images, which point to a significant number of pupils who have difficulties.



Figures 5. Comprehension

Regarding the tasks: “Answering questions on the short text” related to the skills of reading and comprehension of a short story, 84.84% of pupils gave correct answers about the context, relations, and 68.18% of pupils answered correctly about the content of the short story. Furthermore, 26.51% of pupils had no full stop at the end of the sentence, and 12.12% did not write a capital letter when writing a name. Letter replacement, word merging, adding a syllable of the previous word and word omitting pointed to dyslexia and dysgraphia.

Figures 6a and 6 b shows the level of reading and comprehension of a short story of pupils in III grade of primary school.



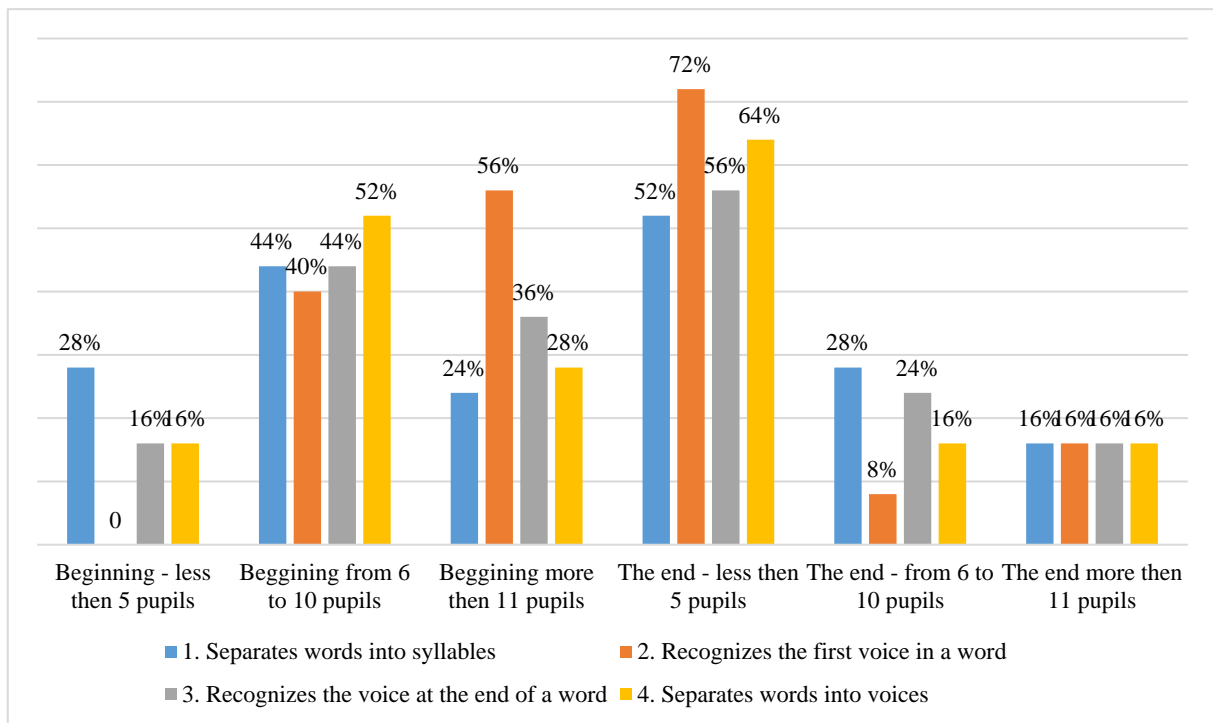
Figures 6a and 6b. Short story – III grade

4.4 Findings Based on the Questionnaire for Teachers

Recognizing the fact that teachers are key persons in the process of acquiring children’s reading and writing skills, we wanted to examine the teaching approach and teachers’ competences related to the pupils’ results in reading and writing. Also, to examine in which way it is recommended to improve the teaching process in order to make better pupils reading and writing outcomes. For this purpose, we used a questionnaire, the data obtained and the results presented below.

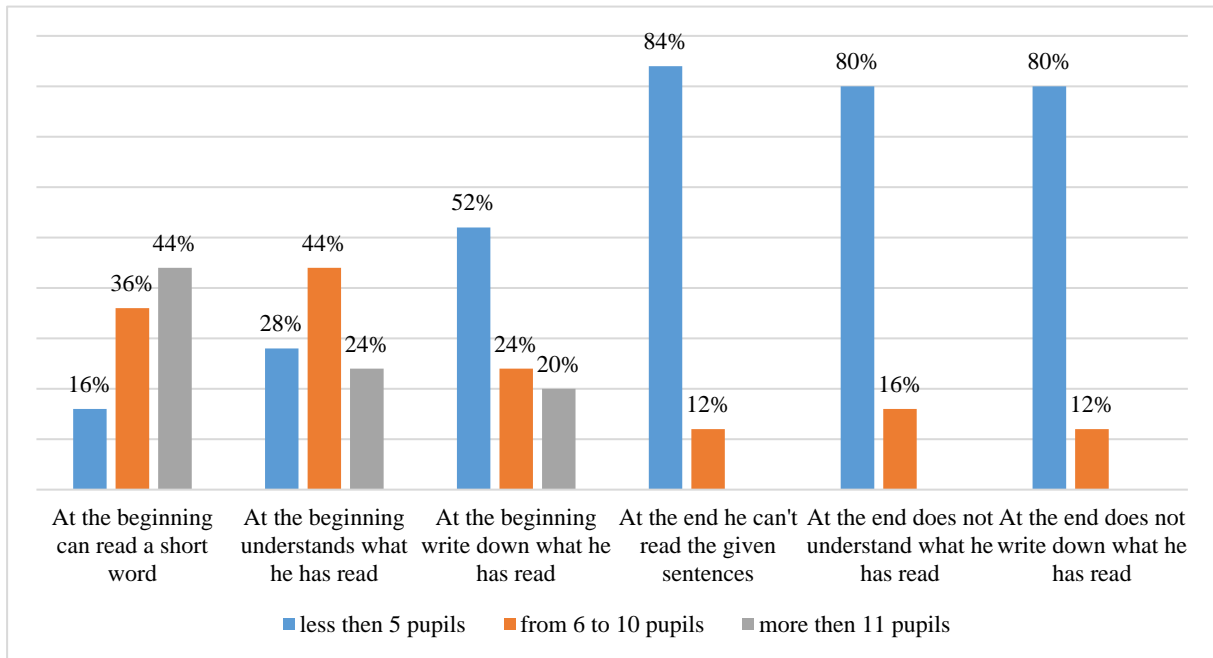
The number of surveyed teachers is 83.

In the group of teachers, we asked them to estimate the number of first grade pupils in one class which are successful in particular skills at the beginning and the end of the school year. Data shows that teachers noticed improvement of the skills among pupils, but still at the end there is a number of them that didn’t achieved those pre-reading skills (Figure 7).



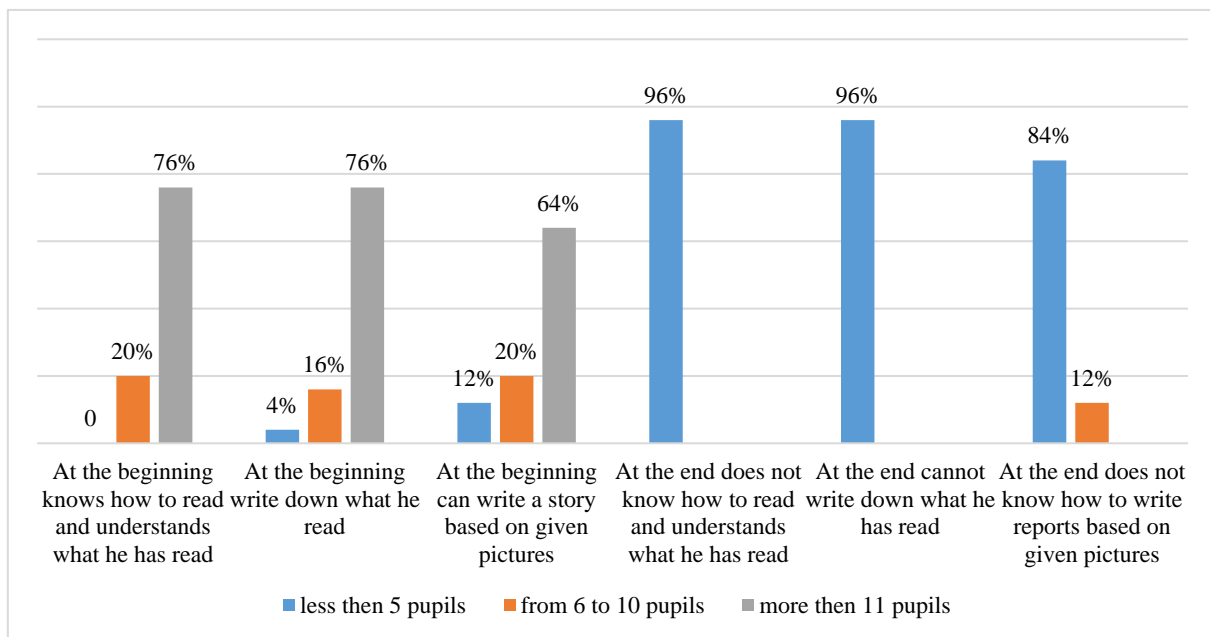
Figures 7. Teachers’ assesment of 1st grade pupils’ achievement at the beginning and the end of a school year

Furthermore, teachers in the II grade of primary school estimate the number of second grade pupils in one class which are successful in particular skills at the beginning and the end of the school year. Data shows that teachers noticed the presence of a significant number of pupils that did not achieve important reading skills (Figures 7).



Figures 7. Teachers' assesment of 2nd pupils' achievement at the beginning and the end of a school year

In this part of questionnaire, we asked teachers to assess the number of pupils in one class in the third grade, who at the beginning and at the end of the school year does know how to read, write, understand what is read and write a short story based on pictures. Data shows that teachers noticed the presence of a negligible number of pupils that at the end of third grade do not achieve expected reading and writing outcomes.



Figures 8. Teachers' assesment of third grade pupils' achievement at the beginning and the end of a school year

In the second part of the Questionnaire, the questions were oriented to the teachers' observation of the curriculum for the subject Montenegrin language for the pupils in the I, II and III grade of primary school, its functionality. The results are presented in the tables 3, 4 and 5. Its shows that teachers have different perceptions of the curriculum and its adequacy, sufficiency for achieving the expected learning outcomes related to the reading and writing.

For example, related to the first grade curriculum, generally observed, the majority of teachers think that there is not enough time, precise instructions and goals that allow pupils to sufficiently acquire pre-reading skills.

Table 3. Teachers' perception of the curriculum for the first grade

Question	Completely agree	Mostly agree	Partially agree	Mostly disagree	Completely disagree
The operational objectives related are clearly defined to the acquisition of pre-reading skills in the first grade.	8 (32%)	2 (8%)	11 (44%)	2 (8%)	2 (8%)
A sufficient number of hours is provided for acquisition of pre-reading skills in the first grade.	2 (8%)	4 (16%)	13 (52%)	6(24%)	
The curriculum clearly provides activities related to the process of acquiring pre-reading skills in the first grade.	4 (16%)	7 (28%)	12(48%)	2 (8%)	
It is justified to have the same number of classes for language teaching and literature teaching	3 (12%)	11(44%)	6 (24%)	5 (20%)	

With regard to the second grade curriculum, teachers mostly think that it's not completely adequate if we want to reach writing skills among II graders: number of classes, clear goals, outcomes and activities.

Table 4. Teachers' perception of the curriculum for the II grade

Question	Completely agree	Mostly agree	Partially agree	Mostly disagree	Completely disagree
The operational goals related to the acquisition of writing skills in the second grade are clearly defined.	5 (20%)	12 (48%)	7 (28%)		
A sufficient number of hours is provided for the acquiring of writing skills in the second grade.		14 (56%)	9 (36%)	1 (4%)	
The curriculum clearly provides activities related to the process of acquiring writing skills in the second grade.	1 (4%)	11 (44%)	10 (40%)	2 (8%)	
It is appropriate to have the same number of classes for language teaching and literature teaching in the second grade	1 (4%)	14 (56%)	8 (32%)	1 (4%)	1 (4%)
A period of one school year is enough for students to master and adopt 64 symbols of the Cyrillic alphabet with the basic elements of reading and writing.	2 (8%)	17 (68%)	4 (16%)	2 (8%)	

When it comes to the perception of the curriculum for the III grade, there is a negligible percent of teachers that think that the curriculum does not prescribe sufficient number of classes, clear goals, outcomes and activities that create opportunities for pupils to achieve reading and writing skills.

Table 5. Teachers' perception of the curriculum for the III grade

Question	Completely agree	Mostly agree	Partially agree	Mostly disagree	Completely disagree
The operational goals related to the acquisition of reading skills in the third grade are clearly defined.	4 (16%)	16 (64%)	5 (20%)		
A sufficient number of classes is provided for the acquisition of reading skills in the third grade.	2 (8%)	12 (48%)	9 (36%)	2 (8%)	
The activities related to the process of developing reading skills in the third grade are clearly given.	2 (8%)	15 (60%)	6 (24%)	2 (8%)	
Sufficient hours are planned to develop and use reading and writing skills to observe, express one's thoughts and feelings.	2 (8%)	11 (44%)	6 (24%)	5 (20%)	1 (4%)
There are enough classes for language and literature classes	3 (12%)	11 (44%)	8 (32%)	2 (8%)	
A period of one school year is enough for students to master and adopt 64 symbols of the Latin alphabet with the basic elements of reading and writing.	5 (20%)	16 (64%)	4 (16%)		

The third part of the questionnaire, examined attitudes about some issues related to the teaching process, suggestions and recommendations for improving the literacy process, the development of a methodical model and teaching procedures to support the enhancement of reading literacy.

Teachers recognize the biggest challenge for I grade pupils': splitting words into voices, proper pronunciation of voices, analysis and synthesis of voices in words, differentiation of terms - voice, letter, word, acquiring work habits, and text content (Figure 9).

Recognized challenges in the II grade are: speech skills, graph motoric maturity, reading with understanding, reading independence, basic spelling rules, and text content (Figure 10).

In the III grade, challenges for pupils based on the teachers' opinion are: using of both letters without mixing, reading with understanding, adopting spelling rules, rich vocabulary and security in oral expression, autonomy in writing shorter texts, oral and written paraphrasing, text analysis, selection of rich texts (Figure 11).

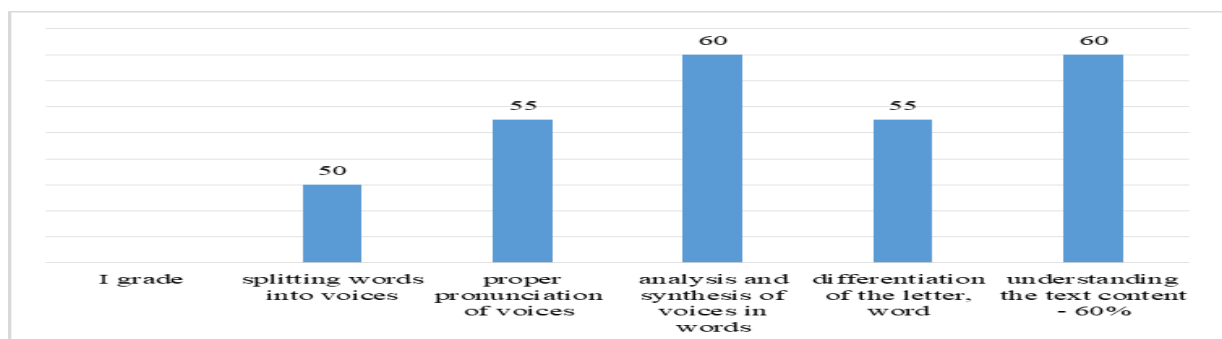


Figure 9. Teachers' perception about I grade pupils' challenges

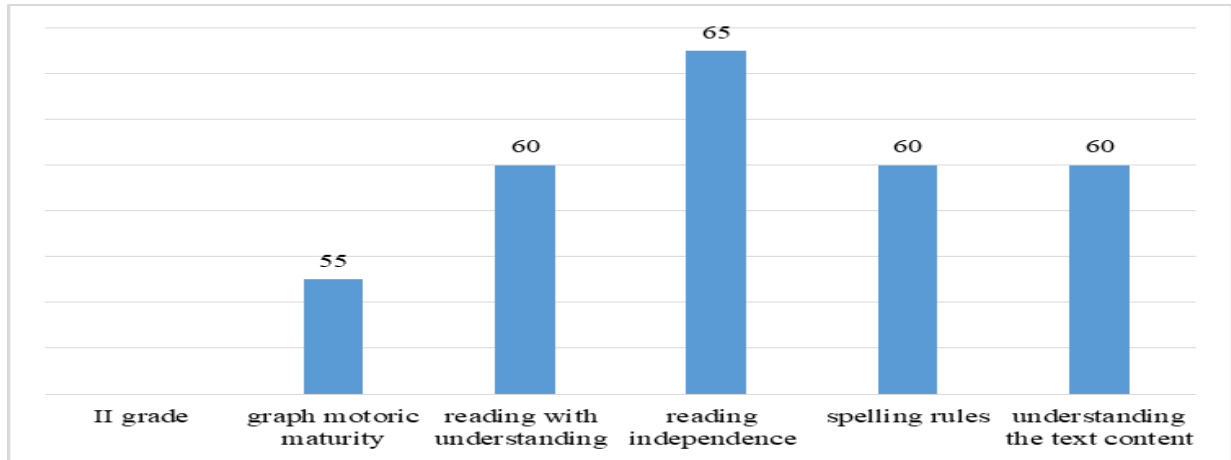


Figure 10. Teachers ‘perception about II grade pupils’ challenges

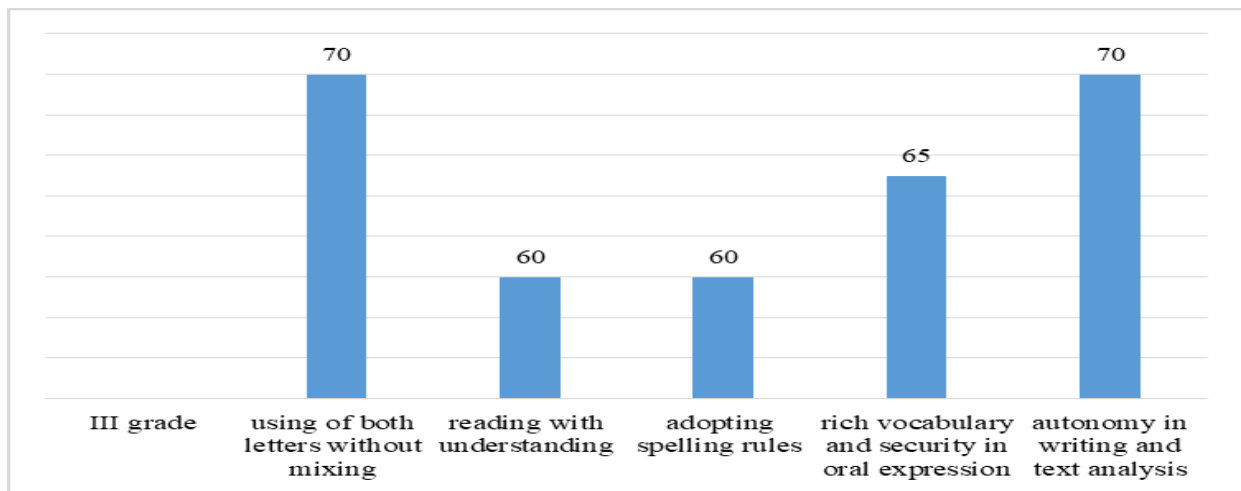


Figure 11. Teachers’ perception about III grade pupils’ challenges

Teachers are faced with the following working-teaching issues (Figures 12).

In the I grade: recognition and pronunciation of voices; separating words into voices (at the beginning, middle and end of words); naming a letter after the proposed voice, letter recognition; too many artistic and non-textual texts; incompatibility of text content; insufficient visual teaching aids.

For the II grade: initial reading and writing, incorrect pronunciation of voices, memorizing and letter recognition, handwriting, mismatched texts, many non-artistic texts.

In the III grade: difficulty is the adoption of the Latin alphabet, Latin and Cyrillic alphabet, understanding of what was read, expression of thought, handwriting, spelling rules, written paraphrasing, mismatched text content, a small number of classes for text processing, reading.

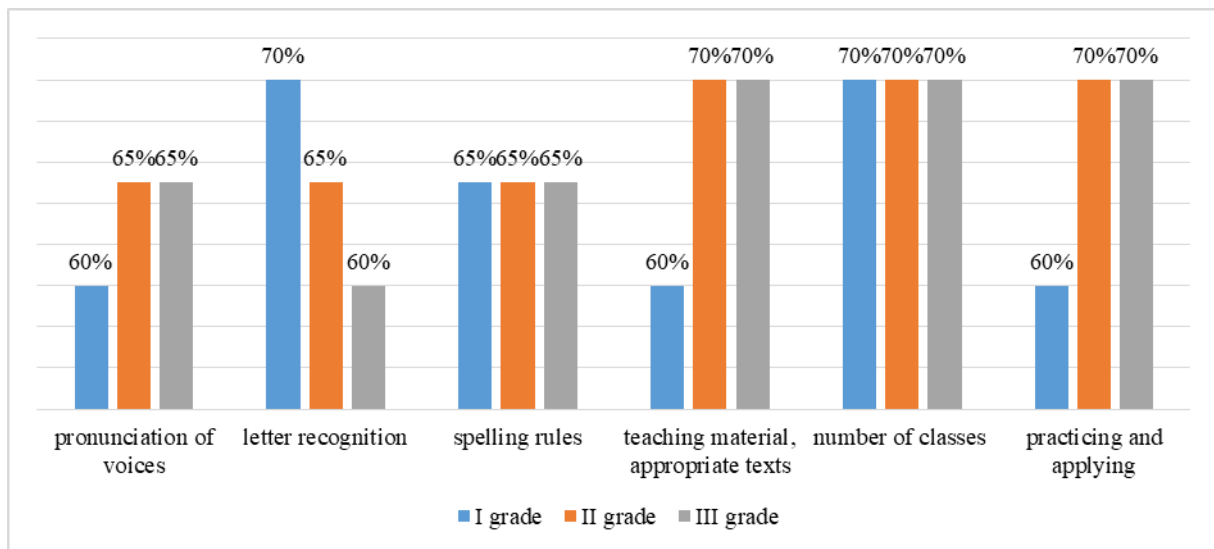


Figure 12. Teachers' perception about issues for their teaching process

Teachers recommendations related to the methodology of work for improving the process in the I grade: Adjusting the material based on the age of the pupil and reducing the number of objectives; learning the printed letters, breaking the words into voices, syllables; more frequent application of modern teaching methods - individualization of teaching, learning through play, performing apparent teaching; didactically designed textbooks, engagement of speech therapists.

For the second grade they suggest: more hours for one text, graph motor and exercises for the development of visual perception, individual work with pupils, perceptible education, more intensive correlation, and work with the speech therapist, curriculum revision - to adapt materials to the age of pupils and to reduce the number of objectives (Graff Silver, 2008).

For the III grade, these recommendations were given: improvement of plans and programs, earlier processing of the Latin letter (before Cyrillic because it is not in wider usage); working on the skill of speaking and writing with several hours of exercise; learning through play, individualizing and performing apparent teaching; didactically-formed textbooks, customized reading assignments and texts, and others.

5. Discussion

In this study, the intention was to examine the characteristics of children in the first cycle of primary schools located in different regions of Montenegro. This includes: detecting and describing the properties of pre-reading skills in I grade, reading skills in II grade, writing and reading comprehension in III grade. Furthermore, to investigate a presence of elements of dyslexia and dysgraphia and their connection with learning and teaching process and to offer recommendation for the improvement.

Our first assumption was that I grade pupils of primary school have not established sufficient pre-literary skills as precondition for the reading and writing competences. In line with that, at first we found that a significant number of children did not master the concept of connecting voices into syllables yet, which means that early mastery of the functional connection of symbols is not applied. We find that there is a significant number of children who have difficulty understanding that words consist of sounds, as well as those who have structural difficulties in experiencing words as a whole. The data indicates that when children do not reach the basic or pre-reading skills, such as skill to divide syllables, organize voices into the syllables, and words, or appropriate spelling, or concept of the whole word, then we can expect that they could be faced with the challenges in the acquisition of the reading skills. Namely, when children do not spell appropriately it is expectable that they will have issues in adequate reading.

Our second assumption was that II grade pupils have issues in reading skills: understanding, recognition, processing of words, sentences. With regard to this, we found that second-grade pupils do not differentiate between printed and written letters; they have difficulties with punctuation. There are also difficulties in terms of the capacity for general understanding and simultaneous processing of information; the quality of decision-making based on what was previously written in the story, experiential coping in new situations. Namely, when significant number of pupils still does not differentiate letters, didn't reach grammar rules, has difficulties to understand the text; processing of information, we are talking about the presence of the existence of elements of dyslexia, dysgraphia, such as: errors in connecting words in a sentence, incorrect punctuation, etc. Also, it is a signal for the potential writing skills, overall

school achievement, interactions, communications, intellectual, emotional development.

Our third assumption was that pupils have issues in writing and reading comprehension in III grade: elaborating, fine graph motoric, and undifferentiated use of printed and written letters. In line with that we assumed that pupils in significant percent show the existence of elements of dyslexia and dysgraphia.

In relation to the pupils in the third grade, there are differences in the range of the connected sentence, the elevation based on the obvious. Uncertainty in writing, insufficient mastery of fine graph motor skills, indecision in writing in a row, etc. are visible. The presence of ignorance of grammatical rules was also noticed: the use of capital letters, punctuation marks, non-differentiation of the use of printed and written letters. Observations have been made regarding letter replacement, word merging, adding the syllable of the previous word, omitting letters, words.

We found that the significant number of pupils does not achieve the curriculum, academic and developmental outcome. This means that they have challenges in reading, and connected with that in writing skills. Namely, when a child does not adopt the basic, initial skills that are conditions for further writing skills, it is expected that it will have difficulties to establish those that are the next step. In this case, we are talking about those when a child has difficulties in dividing voices, then recognizing the symbols, in reading skills: understanding, recognition, processing of words, sentences. This will put the child in a situation where it will be disabled or will unsuccessfully or incorrectly acquire the writing skill. Also it will also put the child in a position to be at risk of presence of elements of dyslexia and dysgraphia. To be clear, we found a significant number of cases where elements of dyslexia and dysgraphia are present, which are related to the lack of basic pre-literature, reading and writing skills. To illustrate: if a child does not recognize voices, or symbols, or does not recognize words it is expected that it will make mistakes such as omission of letters, the presence of word merging or separation to syllables, and the substitution of letters. Its lead them to severe challenges in reading and writing, visible and manifested as dyslexia and dysgraphia.

Our fifth assumption was that the teachers approach is influenced by curriculum obstacles, lessons organisation, insufficient support and instructions for work. Regarding the subject program for the first cycle, after we have collected and processed the data gathered from the teachers we find they are limited in work and children in learning process due to the not clearly defining teaching goals and outcomes, insufficient number of hours for the achieving of pre-reading skills, not appropriate allocated numbers of hours for the teaching of language and literature, not clearly proposed activities related to the process of the adoption of the pre-reading skills.

This was confirmed by the teachers related to the adapting and adjusting of the material in accordance to the age of pupils, then through the improvement of the curriculum, reduction of the number of goals, earlier processing of the Latin alphabet.

We find that it is important to find a way to develop better mechanisms for the adoption of the Cyrillic and Latin, because in current teaching process a child need to learn 128 letters (both in two forms: hand written and printed letters). Namely, if a child in general has difficulties to divide syllables, to organize voices into the syllables and words, to spell appropriate, to differentiated letters, then it is clear that they will have an additional problem when it comes to mastering the letters within the alphabet of Cyrillic and Latin, which have both written and printed forms (in total 128).

Based on the teachers' findings, we concluded that it is important to modernize the teaching process in a way that it uses interactive methods, creates an environment that stimulates an individualized approach related to the children with challenges, performing obvious lessons in which a child could easily make a distinction between letters, alphabets, then to prepare for teachers and offer to the pupils more texts to practice, to improve the didactic design of textbooks and prepare and offer also more stories in pictures, adapting readings and texts, etc. This is the reason why pupils easily achieve and acquire reading and writing skills, when the teaching material is shown and exposed in an age appropriate way. Also when it is well timed and allows enough time to master the letters, step by step.

Moreover, it is important to improve cooperation with the professional service, speech therapist.

Therefore, the following conclusions will allow us to recommend the methodology of work in the first cycle.

Finally, regarding our hypotheses, we concluded and confirmed that in I grade of primary school, pupils are not equipped with sufficient pre-literary skills, as a precondition for reading and writing competences. Then, in the II grade pupils have issues in reading skills: understanding, recognition, processing of words, sentences. Following, pupils have issues in writing and reading comprehension in III grade: elaborating, fine graph motoric, undifferentiated use of printed and written letters. Finally, that pupils in significant percent show the existence of elements of dyslexia and dysgraphia.

Based on the theory, practice, results, discussion, suggestions gathered from the teachers, the following recommendations could influence the improvement of reading and writing skills, overcoming dyslexia and dysgraphia.

1. At an early age, start mastering the contents related to symbols, using printed material for the most frequent

words from everyday life and communication, creating didactic material for learning letters and numbers.

2. in the I grade:

a. Emphasize the development of pre-reading skills

b. Teaching units intended for the development of language skills will be structured with the offered didactic material for the gradual and systematic development of pre-reading skills.

c. To direct the methodology of teachers' approach and work towards functional knowledge, elaboration on the basis of the obvious teaching material, connected with the concrete situations, familiar to the child.

d. Strengthen work on graph motor skills, safety in writing, and differentiation of printed and written letters.

3. In the II grade:

a. Organize the mastering of writing skills from simple to complex tasks.

b. Design appropriate material that would motivate students with requirements, content and topics that are close to them.

c. Put more emphasis on the adoption of grammar - spelling rules.

d. Emphasize general understanding and simultaneous processing of information, application of previously acquired knowledge, experiential coping, especially in relation to new situations.

4. For the III grade:

a. Encourage comprehension skills, application of reading, situational problem solving.

b. Work on encouraging the creativity of writing with the support of pictorial material that would have a motivating role in the average of the story.

c. Encourage independent writing, writing based on printed material adapted to the interests of the child with the application of a methodology that would impact students' interest and importance of reading and writing.

5. It is suggested to improve the curriculum, reduce the number of goals, more clearly define goals, and increase the number of classes for the acquisition of pre-reading skills, i.e. a different schedule of classes for language and literature, richer proposed activities.

6. It is also proposed to introduce the Latin alphabet earlier.

7. The imperative is the revitalization of the principles of active teaching, i.e. the application of innovative and modern teaching methods - individualization of teaching, learning through play, conducting obvious teaching (Batarelo, 2005).

8. In teaching, apply more texts for practice, didactic design of textbooks (more stories in pictures), adapting readings and texts, etc.

9. Improve team work, correlation, instructive and advisory and coaching role of pedagogues, psychologists, speech therapists. It is important because professional associates could provide support to the teachers to assess which children have difficulty achieving reading and writing. Accordingly, they can help teachers choose the best and most appropriate methods of working with these children. Also to prepare teaching material and aids that could help both teachers and pupils in this process. Then, perhaps most important is to help children through individual work to improve their learning strategies and achievements (for example: motivation - psychologist, types of learning - pedagogues, improving a graph motoric – speech therapist, etc.) (Ahuja, 2006).

10. Conduct training to recognize and encourage teachers to intervene and work with students with elements of dyslexia, dysgraphia.

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