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Preliminary communication

THE FREQUENCY AND SOURCES OF HOMEWORK IN SCIENCE AND SOCIAL STUDIES IN CROATIA AND SLOVENIA

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ABSTRACT

Just as each school subject has its own specific goals, so the role of homework depends on the specific requirements and learning outcomes of the subject within which it is assigned. Homework in Science and Social Studies should be assigned in those parts of learning content that will require research-oriented and problem-solving activities, which will enable students to gain experience, develop creativity and apply knowledge and skills in everyday life. The study included primary school teachers in Croatia and Slovenia (N = 144). The observation was conducted in real-life situations during Science and Social Studies lessons. The results show that Croatian teachers assign statistically significantly more homework and use ready-made sources of homework assignments more than Slovenian teachers. Teachers of both countries have preferences towards workbooks as the most commonly used source of homework. The aim of the paper is to emphasize the need for reducing homework in the Croatian practice. It also sheds light on the role of the teacher in designing homework tasks that will not be automatically assigned, but will have a meaningful purpose and be oriented towards students' needs and interests while developing their competencies.

Key words: constructivist learning, homework, Science and Social Studies, sources of homework.

INTRODUCTION

“Homework is a common and widespread educational activity” (Xu, 2013, 98). In the Croatian educational documents, homework is mentioned as part of curriculum planning and programming within guidelines that direct to an independent home-based learning and systematic monitoring of homework (Ministry of Science and Education [MSE], 2006; 2011). Homework can help students with learning disabilities and provide challenging material for advanced learners (Buyukalan, Altinay, 2018). Teachers assign homework for a variety of reasons that mainly relate to helping students revise, apply and integrate the content they have learned and thus get ready for the next day’s class. They also use it to extend student exploration of the learning content more thoroughly than the classroom time permits and to help them learn to use sources, such as libraries, reference materials, websites, etc. (Milbourne, Haury, 1999; Lehr, Walne, 2005). Since the purpose of homework, as well as the sources from which it will be assigned, depend on the specific educational objectives of the school subject within which it is assigned, the role of homework in Science and Social Studies cannot be seen outside the context of the aims of the subject itself. This paper will focus on three primary level school subjects: Science and Social Studies in Croatia and Environmental Studies and Social Studies in Slovenia. In Croatia, the subject Science and Social Studies is taught from 1st to 4th grade of elementary school. In Slovenia, the subject Environmental Studies is taught from 1st to 3rd grade and the subject Social Studies in 4th and 5th grade of elementary school. The aim of the Croatian subject Science and Social Studies is to experience and understand the complexity, diversity and interconnectedness of all the factors that operate in the human natural and social environment, as well as to stimulate curiosity for discovering occurrences in natural and social community (MSE, 2006). The learning content of Science and Social Studies should be problem-oriented and research-oriented on appropriate (practical) work in the laboratory and natural environment (MSE, 2011). Similar aims and requirements are found in Slovenian educational documents for the school subjects Environmental studies and Social Studies. These documents are also focused on students’ spontaneous exploration of the world and their learning about the natural environment and the relationships between the individual, society and natural environment, with emphasis put on personal experience (Kolar et al., 2011; Budnar et al., 2011). It is clear that these subjects require a constructivist approach to learning and teaching the content of those subjects, which is taught not only at school, but at home as well.

Regarding the goals of Science and Social Studies, the main task of teaching this subject is to provide students with the knowledge and experience of the interconnections in the material world that they will gain through constructivist learning, especially through direct experience and research-oriented and problem-solving activities (De Zan, 2005; Borić, 2008). A study by Costa, Salgado & Ferreira (2018) showed that not a single homework task from Environmental Studies was focused on problem-solving activities and that teachers regularly used worksheets as a source of homework, from which the authors concluded that the reproduction/memory strategy is still present in schools. According to the study of Borić & Zečević (2020), the presence of traditional practices in assigning homework in Science and Social Studies could also be found amongst future teachers. The term *traditional practice*, refers to mechanical and reproductive learning with some theoretical application that is contrary to constructivist learning. In terms of the psychological theory of learning and didactic theory of teaching, constructivist learning implies student activity, interaction with the physical and social environment, research-oriented learning and collaborative, situational, practical and experiential learning that enables students to construct their own knowledge (Topolovčan, Rajić, Matijević, 2007). Knowledge should be the result of our own observation and reflection, and learning should have a character of research and discovery (De Zan, 2005). Today's students do not often have a holistic view of events happening in nature and social environment, and therefore they are deprived of an original understanding of things around them (Yerkes, Haras, 1997; Kiš-Novak, 2006). Although the original reality is the most exact source of knowledge in all school subjects, it is especially emphasized in Science and Social Studies teaching. Unlike other school subjects, due to the nature of the teaching content of science-based school subjects, the primary source of knowledge is the original, immediate reality, which includes living and non-living nature, natural phenomena and materials, social relations, etc. (Kostović-Vranješ, 2015). According to Szczepanski (2001), learning science in a natural environment enables us to secure a sort of tacit knowledge where words are not enough, that is why some knowledge of nature must be collected outside the classroom. In Science and Social Studies homework should be assigned with the aim to realize research-oriented and problem-solving activities which will enable students to gain experience, develop creativity and apply knowledge and skills in their immediate reality (Borić, Zečević, 2020; 2021). Homework should not be used to test the content learned, but to learn a new content or how to apply knowledge in creative ways such as interviewing parents about their earliest memories about their first day at school, etc. (Kyriacou, 2001). Alleman et al. (2014) state that if we want to make homework meaningful for

students, it should be rooted in the ideas of authentic learning such as construction of knowledge, disciplined inquiry and value beyond school. Therefore, homework tasks should be built around powerful ideas or central questions, not isolated facts or other content that cannot be applied in everyday practice (ibid.).

According to Glasser (1994), compulsory homework may be the main reason why many students do not see the school as quality school. However, homework should not be seen as a punishment, but should be a positive experience that encourages students to learn more (Paul, 1995). Sallee & Rigler (2008, 46) in their study about homework state that “students ‘borrow’ and copy worksheets to receive completion credit or just show a random page to a teacher who walks around the room stamping notebook pages”. A study conducted by Sokol (2005) shows that students, parents and teachers do not reject the need for homework, but emphasize the importance of its quality. It can be assumed that the reasons of students’ dissatisfaction with homework are closely related to the quality of homework and possibly to its quantity. According to Jensen (2003), homework should be considerably reduced. Homework is important for the learning process, but it is necessary to take care about the appropriate amounts and variety of tasks (Aksu, 2018). As homework is an indirect factor of the student’s learning overload (Juričić, 2006), the paper seeks to explore the amount of homework in Science and Social Studies, Environmental Studies and Social Studies and the representation of different sources from which they were assigned.

METHODOLOGY

The aim and hypotheses

The aim was to examine whether there are statistically significant differences between Croatian and Slovenian teachers in the amount of assigned homework in Science and Social Studies, Environmental Studies and Social Studies and in the amount of used sources from which they were assigned. It also intended to examine the types of lessons for which homework was assigned, the odds ratio between Croatian and Slovenian teachers for the probability that homework will be assigned and to explore whether Croatian and Slovenian teachers have preferences towards any of the sources when assigning homework. In accordance with the aim, the following hypotheses were set.

H_0 : There is no statistically significant difference in the amount of homework assigned by Croatian and Slovenian teachers in Science and Social Studies, Environmental Studies and Social Studies.

H₁: Croatian teachers assign statistically significantly more homework in Science and Social Studies than Slovenian teachers do in Environmental Studies and Social Studies.

H₀: There is no statistically significant difference between Croatian and Slovenian teachers in the amount of used ready-made homework assignments (from workbooks, textbooks and worksheets) compared to assignments designed by themselves when assigning homework in Science and Social Studies or Environmental Studies and Social Studies.

H₂: Croatian teachers use ready-made homework assignments (from workbooks, textbooks and worksheets) compared to assignments designed by themselves statistically significantly more when assigning homework in Science and Social Studies than Slovenian teachers do in Environmental Studies and Social Studies.

H₀: Croatian teachers do not have statistically significant preferences towards any of the sources of homework in Science and Social Studies.

H₃: Croatian teachers have statistically significant preferences towards one source of homework in Science and Social Studies.

H₀: Slovenian teachers do not have statistically significant preferences towards any of the sources of homework in Environmental Studies and Social Studies.

H₄: Slovenian teachers have statistically significant preferences towards one source of homework in Environmental Studies and Social Studies.

Participants, method and procedure

The research was conducted in March 2019 using the observation method. Observation was conducted in real-life situations during Science and Social Studies classes in Croatia and Environmental Studies and Social Studies classes in Slovenia. In order to carry out the research, an appropriate sample was selected. The observers were students of the fourth year of the Faculty of Education in Osijek and Slavonski Brod and the Faculty of Education in Maribor during their professional pedagogical practice. Therefore, observers are considered to be professionally qualified, which (according to Tkalac Verčić, Sinčić Ćorić and Pološki Vokić, 2010), provides the control of reliability, objectivity and validity. The role of the observers was hidden, and the structured observations were performed according to a default structure and after the observed phenomenon. Each observer independently chose a primary teacher from whom he/she will collect data about the frequency of assigned homework and sources that were used for homework assignments in Science and Social Studies lessons in Croatia and in Environmental Studies and Social Studies lessons in Slovenia. The study included primary school teachers in Croatia and Slovenia (N = 144). Half of the primary school teachers

(N = 72) who taught 1st – 4th grade pupils were from Croatia, mostly from the Osječko-baranjska, Vukovarsko-srijemska and Brodsko-posavska counties, while only some were from the Požeško-slavonska, Virovitičko-podravska, Krapinsko-zagorska and Sisačko-moslavačka counties. The other half of teachers (N = 72) who taught 1st – 3rd and 4th – 5th grade pupils were from Slovenia, mostly from the Podravska, Savinjska and Pomurska regions, while some were from the Southeastern Slovenia, Koroška, and Gorenjska county. The research variables were: the type of lessons, the frequency of assigned homework and the sources from which homework was assigned. After each observed lesson of Science and Social Studies, Environmental Studies or Social Studies, the observers recorded the type of lesson, whether the homework was assigned or not and the source from which it was assigned.

Instrument

In order to conduct the research, an observation form was created. For every Science and Social Studies lesson in Croatia or Environmental Studies and Social Studies lesson in Slovenia, the observers had to record the type of lesson (a. development, b. revision, c. evaluation), the frequency of assigned homework and the sources from which it was assigned (a. workbook, b. textbook, c. worksheet, d. (verbally assigned) research-oriented assignment, e. other). The study only examined how frequently a certain source of homework was used, but not the analysis of the quality of homework tasks within any of these sources. Therefore, the results will only show the frequencies of the sources from which homework was assigned.

Data analysis

The collected results were processed in the *Statistica v.13.5.0.17* program. The analysis included development and revision lessons, while evaluation lessons and lessons for which complete information during the observation was not obtained were excluded from the analysis. In total, the results show data from 360 Science and Social Studies lessons in Croatia and 360 Environmental Studies and Social Studies lessons in Slovenia. In the analysis, homework assignments from workbooks, textbooks and worksheets were considered as ready-made sources of homework, while (verbally assigned) research-oriented assignments and other assignments were considered as homework assignments designed by the teacher. To test the first two null hypotheses, the two-sample Z-test was used. The Z-test was also used to test whether there are statistically significant differences in the amount of observed lesson types in the two countries. To test the third and fourth

null hypotheses, namely that data come from assumed theoretical distributions, the one-sample chi-square ($k-1$) test was used, i.e. the test-statistics that was used was based on the deviation of the observed frequencies of the data from the theoretical ones. The assumed theoretical frequencies were calculated based on the theoretical distribution and sample size ($N \cdot p_i$). For each assumed theoretical frequency, a corresponding probability $p = 0.2$ was associated. Thus, the obtained theoretical frequencies of homework sources in Croatia were $285 \cdot 0.2 = 57$, and in Slovenia $113 \cdot 0.2 = 22.6$. Since all theoretical frequencies were higher than five ($N \cdot p_i > 5$), the assumption for the conduction of this test was satisfied. All hypotheses were tested at the level of significance $\alpha = 0.05$. The odds ratio between Croatian and Slovenian teachers for the probability that homework would be assigned was also calculated.

RESULTS

It should be noted here that the results from the Croatian practice refer to the 2006 Educational Programme (MSE, 2006), while in the meantime (as a part of educational reform in Croatia) a new Curriculum of Science and Social Studies has been published (MSE, 2019), but at the time the research was conducted (in 2019), it was still not implemented in Croatian schools.

Table 1 shows the types of observed lessons in Croatia and Slovenia. It is important to highlight the data in order to make a more relevant comparison of homework practice in these two countries.

Table 1. Frequencies (f) and structural percentage ($f\%$) of types of observed Science and Social Studies, Environmental Studies and Social Studies lessons in Croatia and Slovenia

	Croatia		Slovenia	
	f_1	$f_1 / n_1 = \hat{p}_1$	f_2	$f_2 / n_2 = \hat{p}_2$
Development	242	.6722	252	.7
Revision	118	.3278	108	.3
Total	360	1	360	1

Of the total number of Science and Social Studies lessons observed in Croatia, 67.22 % of them were development lessons and 32.78 % were revision lessons. Of the total number of Environmental Studies and Social Studies lessons observed in Slovenia, 70.00 % were development lessons and 30.00 % were revision lessons. A statistically significant difference in the amount of observed lesson types in two countries has not been confirmed (two-sample Z-test, $\hat{z} = 0.80$, $p = .211855$).

Therefore, the type of lesson cannot be considered as an influential factor in the possible differences in the following results.

Table 2. Frequencies (f) and estimated probabilities (\hat{p}) of assigned homework in Science and Social Studies in Croatia and in Environmental Studies and Social Studies in Slovenia

	Croatia		Slovenia	
	f_1	$f_1 / n_1 = \hat{p}_1$	f_2	$f_2 / n_2 = \hat{p}_2$
Lessons which include homework	285	.7917	113	.3139
Lessons which do not include homework	75	.2083	247	.6861
Total	360	1	360	1

Croatian teachers assign homework for 79.17 % of Science and Social Studies lessons, while they do not assign it for 20.83 % of lessons. On the other hand, Slovenian teachers assign homework for 31.39 % of Environmental Studies and Social Studies lessons, while they do not assign it for 68.61 % of lessons. In other words, Slovenian students have homework assigned after every third lesson of Environmental Studies or Social Studies, while Croatian students do not have homework every fifth lesson of Science and Social Studies.

Table 3. Frequencies (f) and estimated probabilities (\hat{p}) of sources used for homework assignments in Science and Social Studies in Croatia and Environmental Studies and Social Studies in Slovenia

	Croatia ¹		Slovenia	
	f_1	$f_1 / n_1 = \hat{p}_1$	f_2	$f_2 / n_2 = \hat{p}_2$
Workbook*	174	.6105	41	.3628
Textbook*	14	.0491	5	.0442
Worksheet*	51	.1790	24	.2124
(Verbally assigned) research-oriented assignment**	26	.0912	24	.2124
Other**	20	.0702	19	.1682
Total	285	1	113	1

*In this paper these are considered as ready-made sources of homework

**In this paper these are considered as homework assignments designed by the teacher

1 A part of the data about frequencies of used sources of homework in Croatia were published in Boric & Zečević (2021), but they are highlighted here for comparison with data from Slovenia.

Table 3 shows frequencies and estimated probabilities of used sources of homework in Croatia and Slovenia. It is evident that teachers of both countries use workbooks as the most common source of homework, although the results show that Slovenian teachers use this source almost half less than Croatian teachers do. Textbooks are used equally by the teachers of both countries, while Slovenian teachers use worksheets a bit more frequently than Croatian teachers. Slovenian teachers assign (verbally assigned) research-oriented homework more often than Croatian teachers and use other sources than ready-made one more often, too.

Table 4. Difference between proportions of assigned homework and of the used ready-made sources of homework

	Croatia		Slovenia		Differences between two proportions	
	$f_1 / n_1 = \hat{p}_1$	n_1	$f_2 / n_2 = \hat{p}_2$	n_2	\hat{z}	p
Lessons which include homework	.7917	360	.3139	360	12.89	.000000
Ready-made sources of homework	.8386	285	.6194	113	4.73	.000001

The results in table 4 show that Croatian teachers assign more homework in Science and Social Studies than Slovenian teachers do in Environmental Studies and Social Studies (two-sample Z-test, $\hat{z} = 12.88913$, $p < 10^{-6}$). Results also show that Croatian teachers use ready-made homework assignments compared to assignments designed by themselves when assigning homework in Science and Social Studies more than Slovenian teachers do in Environmental Studies and Social Studies (two-sample Z-test, $\hat{z} = 4.73183$, $p < 10^{-5}$).

Table 5. Frequencies and odds ratio

	Lessons which include homework	Lessons which do not include homework	Odds ratio
Croatia	285	75	285/75 = 3.8
Slovenia	113	247	113/247 = 0.46
Total	398	322	3.8/0.46 = 8.26

The odds ratio between Croatian and Slovenian teachers for the probability that homework will be assigned was also calculated. The results show that Croatian teachers are 8.2 times more inclined to assign homework in Science and Social Studies than Slovenian teachers are in Environmental Studies and Social Studies.

Table 6. Observed vs Expected Frequencies of homework sources used by Croatian teachers (Chi-Square test)

	Observed frequencies	Expected frequencies	O - E	(O-E)**2/E
Workbook	174.0000	57.0000	117.0000	240.1579
Textbook	14.0000	57.0000	-43.0000	32.4386
Worksheet	51.0000	57.0000	-6.0000	0.6316
(Verbally assigned) research-oriented assignment	26.0000	57.0000	-31.0000	16.8596
Other	20.0000	57.0000	-37.0000	24.0175
Sum	285.0000	285.0000	0.0000	314.1053

Table 7. Observed vs Expected Frequencies of homework sources used by Slovenian teachers (Chi-Square test)

	Observed frequencies	Expected frequencies	O - E	(O-E)**2/E
Workbook	41.0000	22.6000	18.4000	14.98053
Textbook	5.0000	22.6000	-17.6000	13.70619
Worksheet	24.0000	22.6000	1.4000	0.08673
(Verbally assigned) research-oriented assignment	24.0000	22.6000	1.4000	0.08673
Other	19.0000	22.6000	-3.6000	0.57345
Sum	113.0000	113.0000	-0.0000	29.43363

Table 6 shows that Croatian teachers have preferences towards one source of homework in Science and Social Studies ($\chi^2(4) = 314.1053, p < 10^{-6}$). Table 7 shows that Slovenian teachers also have preferences towards one source of homework in Environmental Studies and Social Studies ($\chi^2(4) = 29.43363, p < 10^{-5}$).

DISCUSSION

At the significance level $\alpha = 0.05$, all four alternative hypotheses were confirmed. The first alternative hypothesis (H_1) says that Croatian teachers assign statistically significantly more homework in Science and Social Studies than Slovenian teachers do in Environmental Studies and Social Studies. Given that the results presented in the Croatian practice relate to the one subject only, the amount of homework in total from all school subjects could certainly represent an overload for students. The results of the study conducted by Peko, Dubovicki & Munjiza (2014) show that homework additionally burdens students in Croatian schools,

so they point out that it is necessary to solve the problem of overloaded students in a systematic manner. In Science and Social Studies, homework should not be completely withdrawn, but should be assigned with the purpose of realization of research-oriented and problem-solving activities in those parts of learning content in where it is possible and appropriate to achieve those kinds of activities. The tasks for homework should not be generically or incidentally assigned, but should be thoughtfully planned with a clear purpose, aims and learning outcomes, and used as an educational tool for exploration and application of the learning content (Borić, Zečević, 2020; 2021). If school policies completely reject homework, they will also reject powerful educational tools (Marzano, Pickering, 2007; Pfeiffer, 2018). Homework tasks should be useful as a means of accomplishing curricular goals and each activity should have a primary goal (Alleman et al., 2014). It is important to think about the aim of homework; if it does not have a purposeful aim, it should not be assigned (Jensen, 2003). Homework should not be the continuation of work at school, but something that can only be done at home (Glasser, 1994).

The second alternative hypothesis (H_2) says that Croatian teachers use ready-made homework assignments (from workbooks, textbooks and worksheets) compared to assignments designed by themselves statistically significantly more when assigning homework in Science and Social Studies than Slovenian teachers do for Environmental Studies and Social Studies homework. The third and fourth hypothesis (H_3 and H_4) say that there are statistically significant preferences of Croatian and Slovenian teachers towards one source of homework. It could be seen from the data that teachers of both countries have the greatest preferences towards workbooks as a source of homework in Science and Social Studies, Environmental Studies and Social Studies. Regarding the ready-made sources of homework (workbooks, textbooks, worksheets), Miller & Keller (2017) state that today the textbooks are symbols of the past because now we have access to so many resources and the most important of those is the brain of a well-trained teacher who can design tasks that stimulate and inspire students. In this addition, Kohn (2007, 36) suggests that teachers should “assign only what they design” and “students should be asked to do only what teachers are willing to create themselves, as opposed to prefabricated worksheets or generic exercises photocopied from textbooks.” Although in the Croatian practice homework was assigned based on the 2006 Educational Programme (MSE, 2006), the perception of homework within the new Curriculum (MSE, 2019), which has been published in the meantime, could be mentioned here. It offers one learning outcome directly related to homework: “[...] predict the time required to *write* homework [...]” (italics added). The common term *write homework* can indirectly affect the perception of homework as written

assignments with some theoretical application. However, homework in Science and Social Studies should be considered separately from homework in other school subjects. Just as each school subject has its own specific goals, so does the role of homework depend on the specific requirements, aims and learning outcomes of the subject within which it is assigned. The learning content of Science and Social Studies requires learning through experience, research-oriented and problem-solving activities, as well as multisensory learning. Thus, homework in Science and Social Studies should not be something that has to *be written* only, but something that should *be done* as well. It would be more accurate, therefore, when it comes to homework in Science and Social Studies, to use the term *do homework*.

CONCLUSION

The results of the research show the high frequency of homework in Science and Social Studies in Croatian practice compared to Slovenian practice. It should be noted here that the study covers a small sample, which makes it impossible to generalize about conclusions. However, it can be assumed from the results that the high frequency of homework could influence the choice of the source from which homework in Science and Social Studies will be assigned, since Croatian teachers, along with a high frequency of homework, use ready-made sources more than Slovenian teachers. As it was mentioned in the paper, the results from Croatian practice refer to the period before the start of the educational reform and the implementation of the new Curriculum of Science and Social Studies (MSE, 2019), so we suggest future research in this area related to the amount of homework assignments and their quality as well. The problem with large amounts of homework in the Croatian practice is further emphasized given the current pandemic of the coronavirus and distance learning. The question arises as to whether the practice of frequent homework assignments has remained the same during distance learning. Therefore, the results of this research indicate a greater need for exploration of the phenomenon of homework and obligations that students have at home.

The paper seeks to emphasize the need for reducing homework in the Croatian practice in Science and Social Studies lessons, as well as the need for homework tasks designed by the teacher that will be oriented towards students' needs and interests and towards the development of their competencies. Homework should not be a habit or something automatically assigned, but should be assigned with a meaningful purpose and focused on exploration and application of knowledge and skills in student's immediate reality.

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UČESTALOST I IZVORI DOMAĆIH ZADAĆA IZ PRIRODE I DRUŠTVA U HRVATSKOJ I SLOVENIJI

SAŽETAK

Kao što svaki školski predmet ima svoje specifične ciljeve, tako i uloga domaće zadaće ovisi o specifičnim zahtjevima i ishodima učenja pojedinoga školskog predmeta unutar kojega je zadana. Domaće zadaće u Prirodi i društvu trebaju se zadati u onim dijelovima sadržaja koji će zahtijevati istraživačke aktivnosti i aktivnosti rješavanja problema, što će učenicima omogućiti stjecanje iskustva, razvijanje kreativnosti i primjenu znanja i vještina u svakodnevnom životu. Istraživanje je obuhvatilo učitelje razredne nastave u Hrvatskoj i Sloveniji (N = 144). Promatranje je provedeno u stvarnim situacijama tijekom nastavnih sati Prirode i društva. Rezultati pokazuju da hrvatski učitelji zadaju više domaćih zadaća nego slovenski učitelji i upotrebljavaju gotove izvore domaćih zadataka u usporedbi sa zadatcima koje su sami osmislili više nego slovenski učitelji. Učitelji obiju zemalja preferiraju radne bilježnice kao najčešće korišten izvor za domaću zadaću. U radu se želi naglasiti potreba za smanjenjem domaćih zadaća u hrvatskoj praksi i uloga učitelja u kreiranju domaćih zadataka koji neće biti zadani automatski već će imati smislenu svrhu i biti orijentirani na potrebe i interese učenika i razvoj njihovih kompetencija.

Ključne riječi: konstruktivističko učenje, domaće zadaće, Priroda i društvo, izvori domaćih zadaća.