

Exploring the Content of Cultural Heritage through Project-Based Learning

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Project-based learning facilitates active knowledge construction through group interaction, promoting cognitive engagement and preparing youth for real-world challenges. The paper presents a case study involving twenty-eight Slovenian upper-secondary students, nine of whom opted for project-based learning. Three teacher mentors and four evaluators also participated. The research explores students' perceptions of project-based learning, focusing on the topic of cultural heritage. The findings reveal students' positive views, highlighting overall satisfaction with project-based learning. Issues such as role and work division, character incompatibility, and constant adjustments are acknowledged. The quality of the completed project work assignment is attributed to students' higher-order thinking skills, which are enhanced by teachers' efficient guidance and emphasis on metacognitive skills. All in all, project-based learning fosters a deep understanding of cultural heritage, prompting students to re-evaluate contemporary values and worldviews and be critical of societal changes.

Keywords: project-based learning, higher-order thinking processes, metacognition, cultural heritage, upper-secondary school

Introduction

Project-based learning (PBL), also referred to as project work or the project method, represents an integrated learning approach closely related to problem-based and inquiry-based learning. It incorporates key aspects of collaborative learning, thus leading to a comprehensive exploration of the subject matter (Kokotsak, Menzies, and Wiggins 2016). The approach is characterized by contextualized and authentic learning, encouraging students to work slightly above their cognitive abilities (Krajcik and Shin 2014). It boosts higher-order thinking skills such as critical thinking and metacognitive skills and is central to competencies development (Marx et al. 2004; Krajcik and Shin 2014; Kokotsaki, Menzies, and Wiggins 2016). Moreover, it prepares students for the future work environment, where they will need to be able to put project-solving skills into practice (Helle, Tynjälä, and Olkinuora 2006).

While PBL has been proven to be beneficial to the school system, there is

a lingering mistrust towards its more frequent use among Slovenian teachers, especially those in upper-secondary schools (Lemut Bajec et al. 2023). The reasons that affect their attitudes are often influenced by curricular and national examination (*matura*) requirements. These are, due to their very designated nature, believed to limit teachers' creativity and deter them from experimenting with innovative didactic approaches, thus also affecting students' horizons. Additionally, teachers who are hesitant about the novel approaches harbour preconceptions of their low efficiency, which stems from a lack of knowledge (Lemut Bajec 2019).

Therefore, the primary objective of the study was to explore how a class of upper-secondary school students perceive PBL and react to cognitively demanding project work assignments. Another focus was to assess the impact of PBL activities on students' lives as well as scrutinize evaluators' perspectives on the task that the students submitted. Overall, the study and its findings are believed to contribute to the broader effort of introducing and encouraging new learning practices, thereby helping improve schools to better meet the needs of the rapidly changing world.

Characteristics of Project-Based Learning

PBL as an active method with pre-determined objectives and a planned pathway (Savery 2006) puts students at the centre and requires them to proceed in steps by respecting the timeline (Al-Balushi and Al-Aamri 2014). The project starts with the formation of a project question, which must be meaningful, precise, contextualized, ethical, and relevant to the learners (Krajcik and Czerniak 2018) and is completed with a submitted assignment, report, plan, model, film, etc. (Holubova 2008). PBL gives students more autonomy so that they arrive at information or insights that make sense to them in ways that resonate with their interests, abilities, and learning styles, which boosts their intrinsic motivation, responsibility, independence, and discipline (Bell 2010; Krajcik and Shin 2014). The success of the project work is also attributed to collaborative learning (Bell 2010), which requires team members to plan, negotiate, debate, question, and assess each other's ideas, progress, and final result(s) (Miceli 2019). Teachers act as advisors, coaches, and trainers, guiding the learning process. They must be skilled in giving appropriate feedback, related to the objectives pursued by the students and to the dynamics of group work (Savery 2006). Educators decide for PBL in order to boost complex and abstract thought processes with their students (Krathwohl 2002), which means that students rise above factual knowledge to conceptual, procedural, and metacognitive knowledge as well as from memorization to transfer (Anderson et al. 2001).

Metacognition, also known as metacognitive awareness, self-awareness, self-reflection, and self-regulation (Anderson et al. 2001), is an integral part of PBL. It involves understanding one's thought processes, the strategies employed for particular tasks, and the conditions for their use. It is also the awareness that one's knowledge is limited but can be monitored and regulated (Kuhn 2016). Its implementation is best observed during activities and discussions about different learning strategies, as it is not easily assessed with traditional tests. Learners with metacognitive knowledge of their learning strategies can recognize their strengths and weaknesses, facilitating the transfer of knowledge to new situations (Miceli 2019). Metacognition can be fostered individually and collaboratively, e.g. through self-inquiry, discussion, reasoning, argumentation, clarification, investigation, and judgment, encouraging learners to reflect on and evaluate their actions (Kuhn 2016). Also, engaging in conversations about cognitive processes helps establish knowledge of these processes (Milligan, Astington, and Dack 2007). Teaching metacognition positively impacts both academic performance and personal well-being, fostering students to become more strategic, self-reliant, flexible, and productive (Bell 2010; Perry, Lundie, and Golder 2018).

The Concept of Cultural Heritage in Slovene School Settings

Cultural heritage encompasses tangible and intangible elements, as well as the meanings and relations among these elements within historical, socio-political, and economic contexts (Waterton and Watson 2015). Heritage researchers explore the past through personal and collective memories evoked by cultural and political events, collective interpretations, narratives, ancient objects, etc. (Smith 2007). Cross-generational transmission of knowledge is seen as a central element in the preservation of memory and co-creation of cultural heritage (Fakin Bajec 2020), with young people as important stakeholders in this process (European Commission 2018).

It is important to stress that the concept of cultural heritage is recognized in school curricula, emphasizing the development of personal, national, and transnational identities, as well as teaching respect and acceptance in the present multilingual and multicultural society (Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo 2008a; 2008b; 2008c; 2008d). However, the approaches to do that in everyday school settings are seldom appropriate (Barghi et al. 2017). One reason is the tendency to focus primarily on external signs and symbols, which is a superficial approach (Lemut Bajec 2019) and does not allow for the plethora of opportunities that heritage holds (Fakin Bajec 2019). On the other hand, an interdisciplinary approach, incorporating the latest scientific insights and respecting in-situ trends, of-

fers an ideal platform for a variety of skills and competencies to be facilitated, such as critical thinking, creative, metacognitive, and emphatic skills (Fakin Bajec 2019). This way, it also aids in the development of cultural competencies that facilitate one's self-awareness and sensitivity towards prejudice, conflict, xenophobia, racism, stereotypes, etc., and empowers one to recognize, understand, respect, and embrace cultural variations and their diverse values (Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo 2008a; Allemann-Ghionda 2015).

Methodology

Having laid out the theoretical framework, the study aims to investigate the potential of PBL when addressing the topic of cultural heritage.

Therefore, the following research questions were posed:

RQ1 How do students perceive PBL?

RQ2 How do students respond to challenging tasks in PBL?

RQ3 How did the evaluators assess the submitted assignment?

RQ4 What effects did project work activities have on the students' lives?

To gain deeper insights into participants' perceptions and views regarding various situations, processes, attitudes, behaviours, etc., a case study, as a type of qualitative research, was chosen (Merriam 2019).

Participants

The research was conducted in a Slovenian secondary school with 518 students aged fifteen to nineteen at the time of the research. The sample consisted of a selected class of 28 students aged between seventeen and eighteen and five female teachers, participating as evaluators. Additionally, an English teacher, a history teacher, and an IT teacher were included as they navigated the students through the project work activities. The participants were acquainted with the aims of the study and invited to participate voluntarily.

Data Collection

The data was collected through students' pre-survey questionnaires, students' self-evaluation sheets, and evaluators' sheets in paper format. All three data collection techniques consisted of open-ended questions. The research took place between the 1st of September and the 5th of November 2022.

All twenty-eight students responded to a pre-survey questionnaire containing three questions: *What's your perception of project work? Can you list the advantages and disadvantages? How do you react to demanding project-based activities?*

After completing the project work that resulted in the production of a documentary, only the students participating in it were assigned a self-evaluation sheet as a home assignment. They answered the following questions: *Has intensive engagement with cultural heritage changed your perception of it? If yes, how? If no, why? How do you perceive and justify the differences between the two time periods?*

Finally, the evaluators engaged in assessing the process. Having been informed about the project activities, the criteria, and the subsequent tasks, evaluators received a link to the documentary and recorded their observations on an evaluation sheet. They were instructed to focus on students' thinking processes as well as other factors contributing to the documentary's production.

Project Work Activities

The incentive for the project work assignment was a call by a regional heritage association to the schools that invited young people to engage in the production of a ten-minute-long documentary under the overarching theme of *Youth and local industrial heritage*. The timeframe for submitting the documentary was set at eight weeks from the beginning of the project work activities. All 28 students were invited to join the project and form project teams, yet only nine responded. Thus, a single group was formed. The three teacher-mentors were available to the students at all times; they also regularly monitored the process to keep them on schedule. The history teacher was important in the initial phase as she helped the students get acquainted with the historical frame. The ICT teacher assumed a supervisory role during the filming and editing phases, while the English teacher oversaw the entire process. She also paid particular effort to providing instructions that elicited self-reflection, a critical approach, and constant evaluation from the students.

The students underwent a structured process to complete the assignment (figure 1). First, the team conceived the idea to produce a documentary interview with the five still-living bakers of the once-operating local steam bakery. The topic was in line with the contest criteria (industrial heritage, time frame, young people) as well as with current trends in the local community (i.e. the trend of reviving the baking heritage and the construction of a bak-

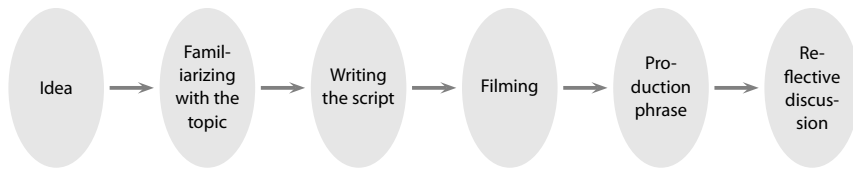


Figure 1 The Sequence of Project Work Activities

ery museum). The students were notified that the project work would occur outside regular school lectures due to the limited participation of only nine students, which made the formal integration of PBL into the timetable unfeasible.

Then, they began by familiarizing themselves with the historical time and place, discussing memory as a historical source. Further, they outlined the filming process and created the setup. Formulating original interview questions aimed at eliciting unconventional answers, they proceeded to interview the retired bakers. After that, the students engaged in reflective exercises prompted by inquiries such as: *How successful do you assess you were? Why do you claim so? Which piece of information surprised you in particular? Was there anything difficult to grasp? Would you be able to put yourself in their shoes?* They filmed some of their reflections and later integrated them into the film.

In the production phase, they focused on crafting an aesthetic product. Here it was decided that additional archive material from the regional museum and the local gallery as well as footage from a local bread factory might be utilized. This is where the teachers intervened to expedite the process and formally requested permits from the institutions for their usage. Then the students revisited their outline and included direct-to-camera interviews, archive materials, and students' re-enactments based on their insights. In this time-consuming phase, the students could turn to their IT teacher for advice if in trouble. Once the documentary was made, the project team and the teachers watched it together and debated its qualities and scope for improvement. Lastly, they were given a self-evaluation sheet as a home assignment.

The film was entitled *Made by Hand*. It depicts the time of the 1960s and 1970s when the local steam bakery was still in operation. Through the memories of four bakers, a story of camaraderie, warmth, and respect for bread as a fundamental commodity of civilization and a reflection of the well-being of the community unfolds. It questions contemporary values and awareness of the local while cautioning against the pitfalls that globalization presents.

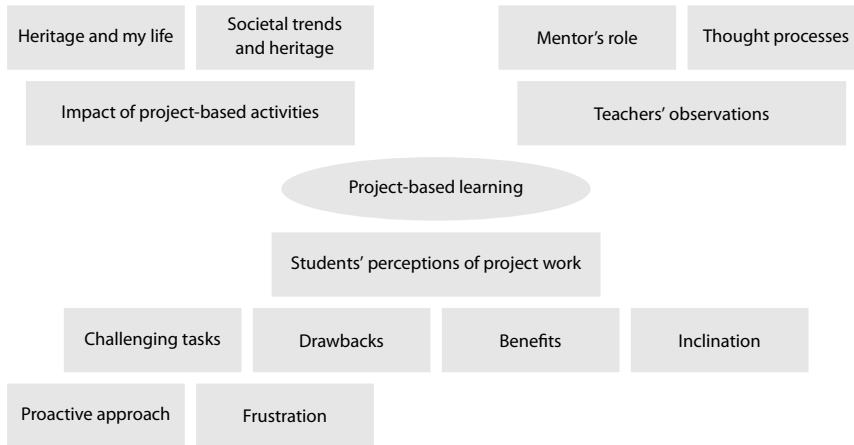


Figure 2 Categories Made upon Semantic Relatedness

Data Analysis

A qualitative content analysis was applied to examine the data acquired through open-ended data collection techniques in order to understand a phenomenon and not to generalize from the study sample to the population (Kordeš and Smrdu 2015). First, the data was thoroughly reviewed in the pre-survey questionnaires, students' self-evaluation, and evaluators' sheets, underlining the keywords. Then it was grouped according to their semantic relatedness within the realm of the research questions, first into lower-order categories and then higher-order categories (figure 2). The last step was the interpretation, which refers to re-assembling and synthesizing and amounted to a coherent understanding and explanation of the researched phenomena (Forman and Damschroder 2007). Thus, all qualitative data obtained from students and evaluators was carefully analysed and cross-compared.

Findings

Findings are reported in three sections: students' perceptions of project work, evaluators' observations, and the impact of PBL on students' lives.

Students' Perceptions of Project Work

The initial aim was to understand how students perceive project work. The majority said they like it because 'I like to collaborate with others,' many said yes, 'provided that the work is evenly divided,' 'the instructions are clear' and 'other team members share the same goals and expectations and are equally

motivated.' A minority were opposed because 'I like to approach the task in my way,' because 'I don't want to adjust' and because 'I concentrate more when I work on my own and am therefore more effective.'

Next, many pointed out benefits such as 'each person gains because we complement each other,' 'we build on each other's strengths, ideas, and knowledge,' 'we help each other,' 'we divide the work' and 'we connect.' Also, 'each member works less,' 'we finish in less time,' 'we do it better' and the overall process is 'more relaxing.' Also, 'you get to know other people's points of view,' and 'become more knowledgeable.'

The drawbacks referred to potential conflicts resulting from factors such as 'the work may not be evenly divided,' 'some do not agree with the assignment of roles and responsibilities,' 'some do not find themselves in the assigned roles,' 'some get overworked, others duck their obligations' and 'some are easily satisfied with the results.' Occasional answers pointed out 'character incompatibility' and 'exclusion of certain team members.' Also, project work 'requires a great deal of negotiation and adjustment.'

Secondly, we wanted to know how the students react when project work confronts them with a challenging task that does not provide them with an immediate answer. The answers were equally divided. One set emphasized proactive thoughts that urge them to 'take time to reflect,' 'think carefully,' 'analyse the task by breaking it into parts' and 'try to make sense of the task,' also by 'consulting with others.' Some described more demanding tasks as stimulating: 'I like it. The more challenging it is, the more personal satisfaction I draw from it afterward.' The other set of answers pointed out that they 'get frustrated,' 'become restless,' 'impatient,' 'bite my nails,' 'feel insecure,' 'disappointed with myself for not knowing the answer,' 'worried what will happen,' 'angry with myself for being incapable,' 'powerless,' 'uncomfortable' and 'stressed out.'

Evaluators' Responses to the Assignment

In their evaluation of the final product, the evaluators were asked to reflect upon the thought processes that the students underwent to manage the project work assignment.

All of them emphasized higher-order thinking processes. They stressed that 'the students needed to be able to differentiate, organize, classify, distinguish between what is more and what is less important, what is relevant and what not to complete the assignment meaningfully.' All in all, they were unanimous that the whole process required high levels of creativity, organization, autonomy, collaboration, negotiation, and decision-making. They

further stressed that ‘students needed to carefully listen to the interviewees’ answers and go for the relevant and most interesting ones,’ ‘they needed to meticulously lay out the plan if they wanted to succeed within the time frame’ and ‘they needed to decide upon criteria of how to organize themselves.’ One of the evaluators seemed to be touched by the message: ‘The documentary clearly shows that the students got to understand the importance the topic carries for the present because they connected it with their values. It has a message and evokes a critical reflection from the viewer. One cannot remain indifferent.’

Lastly, they also emphasized the mentors’ role. One of the evaluators wrote, ‘If it hadn’t been for the mentors’ guidance and friendly rapport with the students, I doubt the final result would be so impressive. The students needed first to recognize the importance of the content. Had they not been captivated, their motivation wouldn’t have been boosted and they wouldn’t have engaged themselves in the project.’ One comment referred to the importance of the teacher’s encouragement to critically approach the task. ‘I think it was this that made the change. They asked themselves about how to proceed, what needed to be changed, how else to approach [the task] and finally, they also needed to verbalize the insights they gained.’

The Impact of PBL on Students’ Lives

As project work assignments facilitate experiential learning, the inquiry focused on determining whether immersion in the topic through project work activities had any transformative effects on students’ lives. All their answers were positive. They wrote that cultural heritage ‘has gained importance in my life,’ ‘I think of it more often,’ ‘I see its presence in my life, in my community,’ ‘without heritage we would be a nation without identity’ and ‘I’m aware of the power past events and achievements have on the present situation.’ One also reflected on the ways his schoolmates regard heritage, saying, ‘Heritage is quite an alienated topic among the youth in general, many think of it as something boring and outdated.’

They also talked about heritage in connection with current societal trends, saying, ‘People used to care for each other more, now the emphasis is on caring for an individual’s well-being.’ Also, ‘People used to live a lot more sustainably, they produced the amounts they needed and used waste in other ways,’ and ‘They needed to invest more effort into making everyday products and so they appreciated them more.’ All in all, they conclude that ‘we are less happy even if we have more,’ and ‘we take the privileges for granted,’ but of course ‘it all depends on the individual’s upbringing.’

Discussion

The findings suggest that PBL nurtures a variety of skills and competencies among students, equipping them for their usage in their current and future lives. Notably, the emphasis on critical thinking skills, such as identifying problems, sorting, comparing, inferring, judging, predicting, reasoning, evaluating, and planning aligns with extensive research underscoring the importance of enhancing these skills also as part of the education for active and engaged citizenship (Krathwohl 2002; Coyle, Hood, and Marsh 2010; Kokotsaki, Menzies, and Wiggins 2016; Seow, Pan, and Koh 2019; Yazidi 2023).

Moreover, the student-centred approach with high levels of collaboration was emphasized, requiring students to exhibit a responsible and autonomous work ethic if the assignment was to be fulfilled efficiently and timely. This aligns with Sirait and Amnie (2023) who measured collaboration skills during project work and reported a collaboration skills indicator of 76.33%, which serves as evidence of the intense interaction occurring during PBL.

Further, the findings confirm the efficacy of PBL in delivering high-quality results. This was evidenced through evaluators' commendations on the students' creativity, aesthetic value, the message of the documentary, and the critical overview it provides. These observations align with the results of a similar study conducted by Hernández Ramos and De La Paz (2009), underscoring the acquisition of well-grounded knowledge, specifically improved historical skills, and the cultivation of positive emotions towards the designated history-related topic.

Moreover, students addressed some of the challenges, such as the unsuitable role assignment, character incompatibility, and different standards of work ethics, which other studies have similarly documented (Ayish and Devinci 2019; Rees Lewis et al. 2019). Additionally, the results prove project work activities to be motivational, which is consistent with other research in this field (Anggraeni 2022; Pradanti and Muqtada 2023).

However, the findings also revealed a discrepancy between students' inclination towards PBL and their actual voluntary engagement in it. Several reasons for that phenomenon are identified: first, students are overloaded with work as well as teachers'/parents' expectations (Shahmohammadi 2011; Pascoe, Hetrick, and Parker 2020), which is why they are reluctant to add additional burdens. Secondly, Slovenian national end-of-school exams adhere to highly prescriptive curricula, where specific guidelines dictate what needs to be taught (Grmek and Javornik Krečič 2004). Unfortunately, the topic of cultural heritage receives less emphasis compared to other 'more central' topics.

Consequently, students may not perceive any additional value in engaging with it. Thirdly, cultural heritage is still perceived by many young people as boring and out of touch with the present times (Fakin Bajec 2019), similarly expressed by one of the students in this research. Fourthly, the fact that the assignment was voluntary did not serve as an incentive; the students were not promised anything in return for their participation. It was anticipated that their engagement would stem from their passion. Consequently, it seems that external motivation in the form of grades, awards, compensation, etc. continues to exert considerable influence (Chandran and Awang 2023).

Further, the findings confirm the idea that PBL surpasses traditional learning methods in terms of complexity, resources, location, and time. The filming process demanded that students extend their focus beyond the conventional learning environment, seeking elements that would give the documentary an aesthetic value and radiate authenticity, which would not be possible solely within the school building. This parallels Al-Balushi and Al-Aamri (2014) as well as Wurdinger, Hugg, and Bezon (2007), who stress that the very essence of PBL is to go beyond in-class learning and provide experiential situations where students encounter meaningful learning experiences.

Additionally, the crucial role of the teacher was acknowledged for their indispensability in guiding students towards producing a quality end product. This was demonstrated by mentors who provided effective scaffolding, evident in the use of guiding questions designed to enhance students' metacognitive skills. These questions prompted students to assess their work and anticipate the following steps, thereby fostering opportunities for self-improvement and enhancement of their ongoing tasks. This finding resonates with the work of several authors (Hmelo-Silver, Duncan, and Chinn 2007; Webb 2009; Chu et al. 2016; Perry, Lundie, and Golder 2018; Miceli 2019) who emphasize the importance of effective scaffolding in easing students' cognitive load as well as serving as a valuable tool for constructive coping with stressful situations.

As seen in this study, time devoted to PBL in an interdisciplinary way influenced and shaped students' perceptions of cultural heritage. By combining history and ITC knowledge as well as many skills and competencies and by respecting in-situ trends, students now claim they are significantly more aware of the importance of heritage in their lives and that is why they show more respect towards it. It might be argued that the creative process of making the documentary empowered them to engage themselves more deeply in their immediate surroundings and created opportunities for their voices to be heard and accepted (Halu Yazıcıoğlu and Güçin Küçkkaya 2016). All in all, the findings align with Maksimović, Stanković, and Osmanović (2020) in their

claims that innovative teaching approaches, when introduced in the right manner, may be the propelling factor that leads to social progress.

Conclusion

The findings obtained in the study prove that PBL has the potential to facilitate the development of a variety of skills and competencies. Notably, higher-order thinking processes are prominent and get enhanced due to the teachers' efficient guidance. Next, students prefer collaborating with others due to better efficiency and a more conducive atmosphere. Despite their inclination, they do not express high levels of enthusiasm to engage with PBL when there is no extrinsic motivation to lure them in. Further, they touch upon unfavourable role and work division, character incompatibility, and the constant need for adjustment. When faced with more demanding project work activities, students report either becoming more proactive or more frustrated, insecure, and powerless. Lastly, based on the completed assignment it can be safely claimed that the approach has the capacity to motivate students beyond the scope of the national examination and curricular requirements. Namely, PBL empowered them with holistic knowledge of cultural heritage, consequently prompting them to re-evaluate their existing values and worldviews. They autonomously reflected upon societal changes, putting themselves into the role of active, engaged, and informed citizens. Nonetheless, it needs to be highlighted that the findings of the present case study are limited to a non-representative sample, which is why further research in this field is highly desired and may enrich the present insights.

To conclude, it is strongly advocated that teachers be entrusted with more freedom and flexibility to choose topics of their own choice, rather than being limited within the narrow and rigid data-burdened prescribed topics assigned by curricular and national examination boards. If this were to happen, teachers might opt for a more diverse, meaningful, and current range of topics and address them using less traditional and more innovative didactic approaches. Overall, this would beneficially affect motivation and provide an incentive for students and teachers alike to look beyond the scope of curriculum-prescribed topics.

References

- Al-Balushi, S. M., and S. S. Al-Aamri. 2014. 'The Effect of Environmental Science Projects on Students' Environmental Knowledge and Science Attitudes.' *International Research in Geographical and Environmental Education* 23 (3): 213–227.

- Allemann-Ghionda, C. 2015. 'Dealing with Diversity in Education: A Critical View on Goals and Outcomes.' In *Governing through Diversity: Global Diversities*, edited by T. Matejskova and M. Antonsich, 125–142. London: Palgrave Macmillan.
- Anderson, L. W., D. R. Krathwohl, P. W. Airasian, A. Cruikshank, R. E. Mayer, P. R. Pintrich, J. Raths et al. 2001. *A Taxonomy for Learning, Teaching, and Assessing: A Revision of Bloom's Taxonomy of Educational Objectives*. Abridged ed. New York: Longman.
- Anggraeni, R. 2022. 'The Effect of Project-Based Learning through Art Performance on Student Learning Motivation.' *Journal of Aesthetics, Design, and Art Management* 2 (2): 134–142.
- Ayish, N., and T. Deveci. 2019. 'Student Perceptions of Responsibility for their Learning and for Supporting Peers' Learning in a Project-Based Learning Environment.' *International Journal of Teaching and Learning in Higher Education* 31 (2): 224–237.
- Barghi, R., H. Aswati, Z. Zakaria, and N. H. Hashim. 2017. 'Heritage Education in the Primary School Standard Curriculum of Malaysia.' *Teaching and Teacher Education* 61:124–131.
- Bell, S. 2010. 'Project Work for the 21st Century: Skills for the Future.' *The Clearing House: A Journal of Educational Strategies, Issues and Ideas* 83 (2): 39–43.
- Chandran, P., and M. M. Awand. 2023. 'Factors that Make Pupils Have High Motivation in Learning History: Pupils' Perspectives.' *International Journal of Academic Research in Business and Social Sciences* 12 (2): 292–303.
- Chu, S., R. Reynolds, M. Notari, N. Taveres, and C. Lee. 2016. *21st-Century Skills Development through Inquiry-Based Learning*. Berlin: Springer Science.
- Coyle, D., P. Hood, and D. Marsh. 2010. *CLIL Content and Language Integrated Learning*. Cambridge: Cambridge University Press.
- European Commission. 2018. 'Youth for Heritage: Young People Bringing New Life to Heritage; Engagement Pillar.' https://icom-europe.mini.icom.museum/wp-content/uploads/sites/24/2018/12/3_Youth_for_heritage_for_NC.pdf.
- Fakin Bajec, J. 2019. 'The Interpretation and Utilization of Cultural Heritage and its Values by Young People in Slovenia: Is Heritage Really Boring and Uninteresting?' *Etnološka tribina* 42 (49): 173–193.
- . 2020. 'Vključevanje skupnosti v razvoj in upravljanje kulturne dediščine v aplikativnih evropskih projektih.' *Glasnik SED* 60 (1): 90–100.
- Forman, J., and L. Damschroder. 2007. 'Qualitative Content Analysis.' In *Empirical Methods for Bioethics: A Primer*, edited by L. Jacoby and L. A. Siminoff, 39–62. Bingley: Emerald.
- Grmek, M. I., and M. Javornik Krečič. 2004. 'Impact of External Examinations (Matura) on School Lessons.' *Educational Studies* 30 (3): 319–330.
- Halu Yazıcırlu, Z., and A. Güçin Küçükkaya. 2016. 'Public Participation of Young

- People for Architectural Heritage Conservation.' *Social and Behavioral Sciences* 225:166–179.
- Helle, L., P. Tynjälä, and E. Olkinuora. 2006. 'Project Work in Post-Secondary Education: Theory, Practice, and Rubber Sling Shots.' *Higher Education* 51 (2): 287–314.
- Hernández Ramos, P., and S. De La Paz. 2009. 'Learning History in Middle School by Designing Multimedia in a Project-Based Learning Experience.' *Journal of Research on Technology in Education* 42 (2): 151–173.
- Hmelo-Silver, C. E., R. G. Duncan, and C. A. Chinn. 2007. 'Scaffolding and Achievement in Problem-Based and Inquiry Learning: A Response to Kirschner, Sweller, and Clark (2006).' *Educational Psychologist* 42 (2): 99–107.
- Holubova, R. 2008. 'Effective Teaching Methods: Project Work in Physics.' *US-China Education Review* 5 (12): 27–36.
- Kokotsaki, D., V. Menzies, and A. Wiggins. 2016. 'Project-Based Learning: A Review of the Literature.' *Improving Schools* 19 (3): 267–277.
- Kordeš, U., and M. Smrdu. 2015. *Osnove kvalitativnega raziskovanja*. Koper: Založba Univerze na Primorskem.
- Krajcik, J., and C. M. Czerniak. 2018. *Teaching Science in Elementary and Middle School: A Project-Based Learning Approach*. New York: Routledge.
- Krajcik, J., and N. Shin. 2014. 'Project-Based Learning.' In *The Cambridge Handbook of the Learning Sciences*, edited by R. K. Sawyer, 275–297. Chappel Hill, NC: Cambridge University Press.
- Krathwohl, D. 2002. 'A Taxonomy for Learning, Teaching and Assessing: A Revision of Bloom's Taxonomy of Educational Objectives.' *Theory Into Practice* 41 (4): 212–218.
- Kuhn, D. 2016. 'Metacognitive Development.' *Current Directions in Psychological Science* 9 (5): 178–181.
- Lemut Bajec, M. 2019. 'Razvijanje koncepta kulturne dediščine s pristopom CLIL.' *Sodobna pedagogika* 70 (36): 82–99.
- Lemut Bajec, M., S. Bratož, T. Štemberger, and M. Ceket Odar. 2023. 'Stališča učiteljev in dijakov od integrativnega kurikula.' *Pedagoška obzorja* 38 (1): 3–18.
- Maksimović, J., Z. Stanković, and J. Osmanović. 2020. 'Application of Didactic Teaching Models: Teachers' and Students' Perspectives.' *Pedagoška obzorja* 35 (3–4): 71–86.
- Marx, R. W., P. C. Blumenfeld, J. S. Krajcik, B. Fishman, E. Soloway, R. Geier, and R. T. Tal. 2004. 'Inquiry-Based Science in the Middle Grades: Assessment of Learning in Urban Systemic Reform.' *Journal of Research in Science Teaching* 41 (10): 1063–1080.
- Merriam, S. B. 2019. 'Introduction to Qualitative Research.' In *Qualitative Research in Practice: Examples for Discussion and Analysis*, edited by S. B. Merriam and R. S. Grenier, 3–18. San Francisco, CA: Jossey-Bass.

- Miceli, L. 2019. 'Interactions and Collaboration in Interdisciplinary Teams Undertaking Project Work in Higher Education.' PhD diss., University of Melbourne.
- Milligan, K., J. W. Astington, and L. A. Dack. 2007. 'Language and Theory of Mind: Meta-Analysis of the Relation between Language Ability and False-Belief Understanding.' *Child Development* 78 (2): 622–646.
- Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo. 2008a. *Učni načrt. Angleščina: gimnazija; obvezni ali izbirni predmet in matura (420 ur)*. Ljubljana: Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo.
- Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo. 2008b. *Učni načrt. Geografija: gimnazija; obvezni predmet (210 ur), matura (105 ur)*. Ljubljana: Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo.
- Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo. 2008c. *Učni načrt. Slovenščina: gimnazija; obvezni predmet in matura (560 ur)*. Ljubljana: Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo.
- Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo. 2008d. *Učni načrt. Zgodovina: gimnazija; obvezni predmet (280 ur)*. Ljubljana: Ministrstvo za šolstvo in šport and Zavod Republike Slovenije za šolstvo.
- Pascoe, M. C., S. E. Hetrick, and A. G. Parker. 2020. 'The Impact of Stress on Students in Secondary School and Higher Education.' *International Journal of Adolescence and Youth* 25 (1): 104–112.
- Perry, J., D. Lundie, and G. Golder. 2018. 'Metacognition in Schools: What does the Literature Suggest about the Effectiveness of Teaching Metacognition in Schools?' *Educational Review* 71 (4): 483–500.
- Pradanti, P., and M. R. Muqtada. 2023. 'Students' Perceptions on Learning, Motivation, and Performance through Project-Based Learning: Undergraduate Students' Case.' *Pythagoras* 12 (1): 16–26.
- Rees Lewis, D. G., E. M. Gerber, S. E. Carlson, and M. W. Easterday. 2019. 'Opportunities for Educational Innovations in Authentic Project-Based Learning.' *Educational Technology Research and Development* 67 (4): 9539–9582.
- Savery, J. R. 2006. 'Overview of Problem-Based Learning: Definitions and Distinctions.' *Interdisciplinary Journal of Problem-Based Learning* 1 (1): 9–20.
- Seow, P., G. Pan, and G. Koh. 2019. 'Examining an Experiential Learning Approach to Prepare Students for the Volatile, Uncertain, Complex and Ambiguous (VUCA) Work Environment.' *International Journal of Management Education* 17 (1): 62–76.
- Shahmohammadi, N. 2011. 'Students' Coping with Stress at High School Level Particularly at 11th and 12th Grade.' *Social and Behavioral Sciences* 30:395–401.

- Sirait, J. V., and E. Amnie. 2023. 'Analysis of Students' Collaboration Skills through Project-Based Learning Model.' *Gagasan Pendidikan Indonesia* 4 (1): 43–50.
- Smith, L. 2007. *Heritage as a Cultural Process, Uses of Heritage*. New York: Routledge.
- Waterton, E., and S. Watson, eds. 2015. *The Palgrave Handbook of Contemporary Heritage Research*. Hampshire: Palgrave Macmillan.
- Webb, N. M. 2009. 'The Teacher's Role in Promoting Collaborative Dialogue in the Classroom.' *British Journal of Educational Psychology* 79 (1). <https://doi.org/10.1348/000709908X380772>.
- Wurdinger, S., J. H. Hugg, and J. Bezon. 2007. 'A Qualitative Study Using Project Work in a Mainstream Middle School.' *Improving Schools* 10 (2): 150–161.
- Yazidi, R. 2023. 'Strategies for Promoting Critical Thinking in the Classroom.' *International Journal of English, Literature and Social Science* 8 (2): 26–40.

Raziskovanje vsebin kulturne dediščine preko projektnega učenja

Projektno učenje omogoča aktivno izgradnjo znanja preko skupinske interakcije, spodbuja kognitivno angažiranost in pripravlja mlade na izzive sodobnega sveta. V prispevku je predstavljena študija primera, v kateri je sodelovalo 28 dijakov gimnazijskega programa, od katerih se jih je devet odločilo za projektno učenje. Sodelovali so tudi trije mentorji in štirje ocenjevalci. Študija se osredotoča na to, kako dijaki dojemajo projektno učenje, še posebej, ko se ukvarjajo z vsebinami kulturne dediščine. Ugotovitve kažejo, da so mladi pozitivno naravnani do projektnega učenja; izpostavljajo učinkovitost in splošno zadovoljstvo s tovrstnim načinom dela. Poudarijo tudi izzive, kot so delitev vlog in dela, nezdržljivost značajev in nenehno prilagajanje. Ocenjevalci kakovost opravljene naloge pripisujejo višjim miselnim procesom, do katerih so mlade pripravili učitelji s spretnim vodenjem in poudarjanjem metakognicije. Projektno učenje omogoča poglobljeno razumevanje kulturne dediščine ter spodbuja učečega se, da razmisli o trenutno aktualnih vrednotah in prepričanjih ter je kritičen do dogajanj v družbi.

Ključne besede: projektno učenje, miselni procesi višjega reda, metakognicija, kulturna dediščina, srednja šola