

Exploring the Potential Benefits of Gamification in an EFL Context: A Qualitative Case Study

Abstract

This MA thesis explores the potential benefits of integrating gamification principles within an English as a Foreign Language (EFL) context. The study employed a qualitative research design, with a single case study in the form of a gamified English lesson to investigate the impact of gamification on student motivation and engagement. The study utilized a questionnaire and a group interview as its data collection tools, and was carried out with eighteen 7th grade students in a Norwegian school, attempting to answer the research question: To what extent does non-digital gamification enhance student engagement and motivation in an EFL context?

The findings of this research indicated generally positive trends, suggesting that students value and enjoy engaging in communicative, and collaborative activities facilitated through gamification. Furthermore, the opportunity to engage in a gamified activity that allowed for creative expression through imagination and creativity was reported as highly valuable in terms of motivation. The incorporation of game elements and mechanics into the learning process resulted in increased motivation, active participation, and authentic language learning. The participants' positive reception of gamified activities highlights the potential of gamification to promote an engaging and interactive educational environment.

This study contributes to the growing body of research on gamification in education and provides insights for educators and practitioners seeking exciting and engaging approaches to enhance EFL instruction. Furthermore, the results demonstrate the benefits of non-digital gamification, making the application of gamified activities more accessible without the need for digital literacy. The results encourage more exploration and implementation of gamification techniques to promote engagement and motivation, creativity and expression, interactivity, and effective language acquisition in EFL settings.

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Introduction

According to a report on global video game consumer markets (DFC Intelligence, 2023), there are over three billion people who play video games around the globe. With an increasing interest in games across the world, and across age groups, the potential for games is immense. Children are enthralled daily with a variety of different games that challenge, engage, motivate, and teach. For instance, Minecraft, which is a popular game with kids (Minor, 2022), promotes engagement through the freedom in exploration, multiplication and counting in building, and problem solving through trial and error. Consequently, Minecraft has already been utilized in educational research (Andersen & Rustad, 2022). However, although the potential benefits in using games, like Minecraft, in education are intriguing, there are inherent downsides to the application of digital games in an educational context. Specifically, the digital literacy required of teachers, and the need for digital infrastructure in a school. Therefore, the call for an alternative approach to games in education is wanted.

Gamification is a term that emerged in marketing to describe the use of game mechanics in a non-game-based context (Deterding et al., 2011, p. 9). The concept has seen a steady rise in interest in recent years and has been adopted by researchers attempting to bring game mechanics into education (Zhang & Hasim, 2023). The core principle of gamification is the application of game-based elements in a non-game-based context to promote motivation, engagement, and learning. To that end, gamification is based on some key game-design principles; goals, feedback and interactivity, balance between skill and challenge, collaboration, storytelling, and competition. These key principles are part of the reason games elicit emotional responses in players and are part of what can make games so motivating and engaging.

Research on gamification in education has demonstrated benefits to motivation, engagement, retention, and proficiency (Zhang & Hasim, 2023., Far & Taghizadeh, 2022). Moreover, previous research has shown how gamification can be successful in creating an authentic environment for language learning, meaning the context of the language learning activity is perceived as authentic, leading students to “forget” that they are utilizing a foreign language, and are instead wholly focused on communicating (Zhang & Hasim, 2023., Egbert, 2003). Additionally, findings reveal that gamification, like games, is conducive to entering a flow state. A state of flow is described as a moment where an individual becomes fully engaged in an activity and loses track of time and “sense of self” (Csikszentmihalyi, 1990). To achieve this, the activity should be balanced in terms of skill and challenge, have a clear goal with adequate feedback throughout, and finally a feeling of control (Egbert, 2003, p. 502-505). Interestingly, the conditions that need to be in place for a flow state to occur are those found in games too. Therefore, the aim of this thesis is to investigate these potential boons to motivation and engagement using a gamified activity.

This thesis aims to investigate the extent to which gamification can benefit the motivation and engagement of elementary school students. To do so, the study employs storytelling, autonomy, collaboration, communication, and creative expression, in a single activity to see the effects of these game-design principles in a non-game-based context. Furthermore, due to the potential difficulties with digital tools, this thesis aims to investigate non-digital gamification to make it more accessible to teachers that want to apply its principles to their teaching. Thus, this thesis attempts to answer the research question: To what extent does non-digital gamification enhance student engagement and motivation in an EFL (English as a Foreign Language) context?

To investigate the RQ, the thesis employs a qualitative research design with a single case study, a questionnaire, and a group interview with the intent to explore the complex phenomenon of motivation in 7th grade students. However, to investigate the benefits to motivation and engagement, this thesis looks at theoretical perspectives on motivation such as Self-Determination theory, Expectancy-value, Flow, and Task-Based learning. Moreover, constructivism is considered as a relevant and applicable learning theory in this context. Learning by discovery is a constructivist concept that is relevant to games, and gamification (Schell, 2019, p. 144). Although games often introduce their mechanics in a tutorial, it is often through exploring and experimentation that the player discovers and expands on the mechanics, making the theory relevant as a link between learning and games/gamification.

The impetus behind the research design and the thesis itself, was the assumption that gamification will lead to engagement, which in turn might lead to a motivated student. This assumption was built on several metaphorical “blocks”, namely, experience with games and their effects on motivation, experience with creative and interesting activities in an educational context leading to engagement, experiences with a state of flow in both game, and educational contexts, and finally, the understanding that both theory and literature present theoretical viewpoints that align with motivational experiences in games and education. These blocks constructed an assumption that interesting activities lead to engaged students, and engaged students lead to motivated students. And, following that thread, the assumption naturally wandered to games and the application of game-based elements to create interesting activities in school.

Thesis outline

Chapter one (Theory and Literature review) outlines theoretical perspectives and literature relevant to this thesis. Specifically, educational, EFL, and game related theoretical perspectives on constructivism, motivation, engagement, and the principles of designing instructional activities that promote intrinsic motivation. In addition, the chapter presents previous research on the benefits of gamification, and the theoretical benefits of gamification.

Chapter two (Methodology) outlines the nature of qualitative research, along with an overview of the research design employed in this study: Case study, questionnaire, and interview. The chapter

also explains the gamified lesson utilized in the case study, as well as a description of the participants, the school where study took place, and the participants' teacher. Lastly, the chapter describes concerns for validity and reliability in the study, and the potential limitations with the study, ending with a consideration on the ethics surrounding the study.

Chapter three (Results) presents the data collected during the study without speculation or interpretation. The chapter is divided into two sections, describing the data from the questionnaire in one section, and the interview in the other.

Chapter four (Discussion) the meaning and implications of the results are discussed, interpreted, and put into context. The chapter is divided into five parts, focusing on different interpretations, and educational implications in relation to the RQ. The chapter also discusses the limitations of the study, and the implications for future studies.

Chapter five (Conclusion) summarizes the thesis and concludes based on the discussion in chapter five, the experiences made throughout the project, and the main findings. The chapter and thesis end with recommendations for future research, and potential applications of gamification in education.

Theory and literature review

This chapter of the thesis will look at the relevant theory and literature to answer the research question:

- To what extent does non-digital gamification enhance student engagement and motivation in an EFL context?

The first part of the chapter describes constructivism as the relevant learning theory for this thesis. Following constructivism, the chapter moves on to gamification and game design principles. After outlining the theory on gamification, we move on to a brief look at two research articles on gamification. The first article investigates recent research in gamified EFL/ESL instruction, benefits, and drawbacks of using gamification, and gamification elements. The second research article describes a study where digital and non-digital gamification elements were utilized in an Iranian EFL context to investigate the potential benefits of gamification.

Subsequently, the chapter wanders over to motivation, and how the theory on motivation relates to gamification and its elements, ending with a practical method for promoting intrinsic motivation in instructional design that is applicable to gamification. Motivation is at the core of this thesis' concern, therefore, most of this chapter is dedicated to outlining theory on how motivation relates to gamification, EFL, and education in general.

Constructivism

Constructivism is a learning theory that views learning as an active process where individuals learn by doing, or through trial and error. Constructivists see students as active participants in learning, where cognitive development and a thorough understanding of subjects is the goal. Constructivists claim that knowledge and understanding is discovered through experimentation and reflection, and that knowledge is always constructed by the individual (Laroche & Bednarz, 1998, p. 4). Constructivism differs from other educational psychology theories that posit that knowledge exists outside our mind somewhere, and we learn by discovering or being shown the knowledge (Imsen, 2017, p. 45). The constructivist philosophy influences the way educators consider their teaching. If knowledge is constructed in the mind based on personal experience and understanding instead of discovered “neatly” packaged, it has implications for how teachers educate. Constructivists argue that the individual assimilates knowledge, and

accommodates the knowledge when new information is discovered, effectively altering, and expanding on an individual's understanding of a subject. This process of assimilating and accommodating knowledge is driven by the individual's internal motivation for making sense of the conflicting information he is confronted with (Imsen, 2017, p. 155). For instance, a young child explains and understands rain as the sky crying. When the child matures, it no longer makes sense that the sky would cry, as the sky is not a person or a living thing. Therefore, the child seeks equilibrium in their knowledge and needs a new way to understand why it rains. Through experimentation, discovery, education and accommodation, the child finds his way to the knowledge of why it rains. This process of making sense of information using existing knowledge, or new knowledge, is key to the internal motivation for learning (Imsen, 2017, p. 154).

Learning by discovery is a constructivist term formulated by Jerome Bruner, that embodies the “problem-solving” aspect of learning. Bruner argued that students encounter “problems” in subjects that they need to solve in order to learn and gain new understanding (Imsen, 2017, p.170). These “problems” are the so-called core principles in different subjects. For instance, the scientific method of creating a hypothesis, verifying it through experimentation and concluding. This method, when applied to education, can be utilized in various stages of education. Even young learners could potentially apply this method to their learning. Furthermore, applying this philosophy early on will likely solidify its way of thinking for the students as they progress in their education (Imsen, 2017, p. 170). Applying the principle of learning by discovery in another subject, like language, the student becomes active participants in their learning. In other words, the students are not given the concept or target of learning, instead they must discover it themselves with the material they are provided. In this way, the student is encouraged to find understanding based on their experiences and observations. This idea, among others, is mirrored in games. The principles of gamification, and games in general, match some of the constructivist principles. Specifically, the idea of learning by discovery or through trial and error, is prevalent in digital games (Schell, 2019, p.144). It is not unusual for a game to present a challenge where it is expected that the player learns to overcome that specific challenge through trial and error. This idea is similarly present in constructivism's view of learning, where the learner encounters a problem or challenge in a subject and must overcome the challenge to gain new understanding (Imsen, 2017, p. 170). Consequently, constructivism can be considered the concrete to this

thesis' foundational theory. In other words, the principles for learning in constructivism help inspire the link between gamification and education.

Gamification

The term gamification is relatively new, with the first documented use of the term being back in 2008 (Deterding et al., 2011, p. 9). Originally, the term was used to describe the use of game mechanics in non-game contexts, specifically in a marketing context. In recent years, however, the term has been adopted by other organizations and researchers, with the idea of using game mechanics to engage and motivate in a variety of settings. One of these is the educational application of gamification. Research on how game mechanics can promote engagement and motivation in the classroom has seen a rise in recent years (Silva et al., 2021., Kapp, 2012., Zhang & Hasim, 2023). Although the term has been adopted by a variety of market niches, the term itself still describes much of the same idea; making learning fun and engaging by utilizing game-based concepts in a non-game-based context.

According to Kapp (2012, p.7) a game is "...a system in which players engage in an abstract challenge, defined by rules, interactivity, and feedback, that results in a quantifiable outcome often eliciting an emotional reaction." This definition is helpful in discussing gamification, as gamification is defined as the use of game design, game-related practices, and game-elements that are characteristic for games in a non-game context (Deterding et al., 2011, p. 13). Although the use of game technology and full-fledged games is a viable way of gamifying, this definition does not imply that gamification principles are dependent on the use of a full-fledged game. In other words, gamification refers to the implementation of game design principles or elements, digital or otherwise, in a non-game context. With this definition in mind, gamification in an educational context refers to implementation of game design principles or elements in an educational setting, like a gamified classroom environment or a gamified lesson. These elements, when applied properly can be used to create more engaging, fun, and interactive learning experiences that promote active participation, feedback, and reflection.

Game design principles

Games can be varied in their design and scope. Consequently, not all game design elements are applicable to an educational context. There are a variety of game design principles that are

relevant to actual digital games. For instance, the mechanics of controlling a digital avatar is hard to replicate in a physical setting. However, some game design elements are more relevant to gamification and education, and it is necessary to understand these principles to use them to gamify. There are several principles associated with game design that are relevant to education. In their systematic literature review, Silva et al. (2021, p. 9) points out that some game-design principles must be present in a game-based setting: allowing for repetition of challenges so that experience can be attained, and a goal might be reached. Subsequently, they note that immediate feedback on performance is a key aspect of engagement and flow as it allows for highlighting good performance and allowing for different roads to success. It is necessary to outline some of the key elements in game design to allow for further discussion and utilization of said principles.

Six principles of game design

The first principle relevant to this thesis relates to goals. Games are designed with achievable goals for the player. These goals are meant to keep the player engaged and provide a sense of progress and achievement. These goals are often reached by solving various problems. Solving problems is perhaps the most notable activity that can be applied to education. Moreover, these goals are often reached through trial and error, and designed based on educational psychology used by educators for years (Kapp, 2012, p. 12). Learning aims are the goals of the education context, the learning aims represent the goals for the students. At the end of this lesson, you should know X. At the end of this game challenge, you should know how to handle X. In the end, goals are often what the mechanics of a game are built around, and what a subject lesson is built around.

The second principle describes the importance of feedback. Games are designed with a feedback system which helps players track their progress and understand what they are doing right or wrong in a situation. When feedback comes as a direct result of an action, it is easy to stay focused on the task, and it allows the player to learn through trial and error (Schell, 2019, p.144). Corrective feedback is a core feature of teaching. Students need feedback to understand where they are in their learning process, along with what they are doing right/wrong, and how they can reach their goals (Kapp, 2012, p. 12). The principle of feedback can also be tied to the interactivity associated with games. Interactivity is vital for a game to be engaging. Without

interactivity, the game does not move forward, and the player does not move forward. Interacting with the game triggers some form of feedback from the game, which propels the player forward (or backwards in some cases) (Kapp, 2012, p. 12). The relationship between interactivity and feedback may be transferable to an educational context as well. where a student interacts with an assignment and receives feedback from the teacher or their peers.

The third principle relevant to this thesis is balance. Balance is an important aspect of a game. Games are balanced in such a way that the challenges are never *too* challenging, which serves to keep players engaged and motivated to progress. In other words, games attempt to engage and energize the player with challenges that are not too hard or too easy (Kapp, 2012, p. 12). The principle of balance is also tied to its mechanics. Mechanics in a game context may refer to time constraints, point systems or badges, levels, or the interaction between different game-tied abilities, etc. (Kapp, 2012, p. 12). For instance, time constraints need to be balanced in a way that feels “fair” and is suitably challenging for the player. Applying mechanics to a non-game-based context could mean awarding “badges” to a player or student when they complete a task as a “reward”. Balance is an important part of education as well, especially when considering the differentiation of tasks, activities, and assignments. Furthermore, balance is also tied to the theory of zone of proximal development and the motivation theory of flow, which will be discussed further into the chapter (Csikszentmihalyi, 1990., Vygotsky, 1978).

A fourth principle that is prevalent in games is collaboration. Working together to solve problems and puzzles, collaborating towards a common goal are all parts of what can make games a social and collaborative experience. Gamification can incorporate collaborative activities and social interactions with peers and instructors. Collaborative activities can promote teamwork, problem-solving, and peer feedback (Dicheva et al., 2015, p. 4). Social interactions with peers and instructors can create a sense of community and promote engagement and motivation (Kapp, 2012, p. 11). Collaboration is a natural part of education, and the Norwegian school, where students interact and cooperate with each other to solve problems or create projects or presentations. In other cases, collaboration is simply two or more students engaging in an activity together, constructing understanding and meaning together throughout the process (Taguchi & Kim, 2016, p. 417., Utdanningsdirektoratet, 2017, p. 11).

The fifth principle that is interesting to consider is storytelling. Many games are designed to tell a story, and oftentimes, the story unfolds naturally as part of the players progression. In other cases, the story simply serves as the backdrop for unique challenges and trials for the player to engage in. In any case, storytelling can draw in the player, and is part of what can make games fun and engaging (Kapp, 2012, p. 11). Therefore, drawing the player in with a story might allow for a fun setting where the player can complete tasks and challenges where learning might take place. It might be useful to consider creating a narrative or story where the students can explore and learn in an “immersive” setting where tasks and activities are part of the progressing story (Kapp, 2012, p. 55).

The last principle relevant to gamification is competition. There is often an element of competition associated with games. Teamwork and competition can work together to create an engaging experience (Bakan & Bakan, 2018, p. 131). Moreover, the competitive design that is often found in games and gamification can help to keep players engaged in problem-solving because they are focused on doing their best in the spirit of competition (Kapp, 2012, p. 12). Furthermore, a competitive nature may generate motivation in players/students, which is in some ways the main objective of games, to keep the individual constantly engaged. Applying this to an educational context, an ideal situation could present itself as students who remain engaged in an educational activity, motivated by lighthearted competition with their peers. On the other hand, being motivated by competition is not a universal fact for all students, and in some cases, it can even be detrimental to motivation. As such, it is important to consider the individual student when utilizing competition.

Although several research articles that discuss gamification consider the digital aspect of gamification (Silva et al., 2021, p. 8), the definition of gamification established in this thesis does not limit the use to the implementation of digital game-based resources. Case in point, board games are not limited by digital assets or resources and are still in the category of a game-based resource. Digital gamification has the potential to be immersive, engaging, challenging, and rewarding. However, the use of digital game-based resources requires a certain technological infrastructure and a digital “know-how” to be utilized effectively. Besides, physical games, like board-games, meet the requirements per the definition of gamification. For instance, Dungeons & Dragons is a tabletop-role-playing game, meaning a game that is played on a flat surface, i.e.,

a board game. Dungeons & Dragons utilizes most of the principles mentioned so far, namely, cooperation, storytelling, balanced encounters (puzzles, riddles, combat, etc.), goals, and feedback. In other words, gamification without digital assets should be perfectly viable (Far & Taghizadeh, 2022, p. 2).

Research on gamification

The popularity of games is undeniable, and the research on games and their pros and cons flourishes. There are many books, articles, and reports on the benefits of games and gamification (Kapp, 2012, p. 76). To some extent, gamification has captured the zeitgeist, therefore it becomes especially important to delineate scholarly work, and not so scholarly work. That there is so much writing on games and gamification in different fields of study and markets makes it important to distinguish between conjecture and peer-reviewed articles. Moreover, it situates this thesis' focus in the “field” of gamification studies. As such, the two research articles this chapter will describe are peer-reviewed articles, to ensure the validity and authority of information, and to demonstrate the kind of studies being done and the seriousness of the work.

A systematic review of empirical research on Gamification

Frontiers in psychology states their mission as “Our research journals are community-driven and peer-reviewed by editorial boards of over 202,000 top researchers” (Frontiersin. 2023). Zhang & Hasim (2023) authored an article published in this journal where they carried out a systematic review of empirical research on gamification in EFL instruction. In their review, they searched the Web of science and Scopus databases for relevant articles. In their investigation, they aimed to “...present the characteristics of the recent research in gamified EFL/ESL instruction, benefits and drawbacks of using gamification in EFL/ESL instruction, and gamification elements.” (Zhang & Hasim, 2023, p. 1).

Their search was carried out using fifteen relevant key words, and through a comprehensive summary of the relevant research, they found forty journal articles that fit their criteria. Their investigation sought to answer three questions about gamification in an EFL context; “Current research state of the use of EFL/ESL field”, “Learners experiences and the impact of gamification on learners”, and “Gamification elements used in the reviewed studies”. (Zhang & Hasim, 2023, p. 5-7).

The findings relating to their first question indicate that the current state of research on gamification in EFL is primarily considering digital tools for gamification. Zhang & Hasim (2023) reference several studies where the application of digital tools like Kahoot, Duolingo, Moodle, and others, were the vehicle for gamification. This finding identifies a potential gap in the research field, as the application of non-digital gamification has not received the same attention. Hence, this thesis' focus on gamification through non-digital means.

The investigation focused on learners' experiences with gamification revealed that "...both students and teachers held a positive attitude toward using gamification in EFL/ESL learning and teaching, because a gamified course system did increase students' motivation to learn..." (Zhang & Hasim, 2023, p. 5). Moreover, the findings indicated that gamification was successful in stimulating students' interest and engagement in learning English, as well as helping to create an authentic environment for language learning. In addition, the studies demonstrated how gamification could help encourage routines of self-learning and foster autonomy in learning. Moreover, the review revealed that a gamified learning environment improved English skills in reading, writing, speaking, and listening. (Zhang & Hasim, 2023, p. 6, 7).

Despite the positive findings relating to gamification, Zhang & Hasim (2023) note that there were also reported downsides to gamification. One downside was the technical difficulties that could occur with the use of digital tools, giving even more reason for this thesis' focus on non-digital gamification. Digital tools leading to technical issues are a possibility whenever they are utilized. Moreover, they require a certain digital literacy to be fully utilized, especially with less risk of technical issues. If, however, gamification was utilized without digital tools, the risk of technical issues would be eliminated. Another downside they noted was competition in education. Specifically, how competition could lead to learning anxiety, and in the worst case could scare off students from participating in the activity because of a fear of failure (Zhang & Hasim, 2023, p. 6). The examples of competition referenced in the article were mainly comprised of class-wide leaderboards where "failure" to perform as well as other students would be very visible. The downside to competition in this context is not a given, however, the risk for learning anxiety, and fear of failure is certainly a downside. However, a positive classroom environment,

and solid relationships between students and teacher, might mitigate the downside of competition (Imsen, 2017, p. 356).

The final question that Zhang & Hasim (2023) attempted to answer was which gamification elements were most frequently utilized in the application of game-based instructional activities. Their findings revealed that feedback, points, quizzes, digital badges, leaderboard, and reward, followed by progress bar, story-telling, challenge, videos, time limit, and competition were the most recurring elements found in their analysis (p. 7). Interestingly, relevant elements that saw less use were, among others, collaboration, and role-playing. These findings indicate another gap in the “field” of gamification studies, as both role-play and collaboration are of interest in this thesis. Moreover, Zhang & Hasim (2023) report how gamification studies favor higher education, whereas this thesis is based on 7th grade students. Although not necessarily a gap, it is indicative of the considered applications for gamification in the field so far, and Zhang & Hasim (2023) encourage future research to focus more on gamification in elementary school (p. 10).

Digital and non-digital gamification

As mentioned, the validity and authority of the research studies is significant. Thus, the second research article relevant to this thesis was published in *Computer Assisted Language Learning* where “all research articles in this journal have undergone rigorous peer review...” (Computer Assisted Language Learning, 2020). The inclusion of this article was predicated both on the “rigorous peer review...” and its content.

In their article, Far & Taghizadeh (2022) investigates the effects of digital and non-digital gamification on EFL learners’ collocation knowledge, perceptions, and sense of flow. To investigate this, they looked at seventy-five Iranian EFL students, ranging from fourteen to seventeen years old, split into three classes. Each class was given either a digitally gamified, non-digitally gamified, or a non-gamified treatment. The vehicle for the testing was for students to learn about collocation. The data collection methods utilized in the study included a pretest and a posttest of collocation knowledge, flow state questionnaire, three open-ended questions, and a semi-structured interview. The flow state questionnaire was used to determine the extent to which learners experienced flow during the gamified activities (Far & Taghizadeh, 2022, p. 8).

The game elements chosen to utilize in the study were: points, badges, leaderboard, progress bar, bonus cards, and a final award. Points were awarded based on correct responses during the different activities. Badges were awarded based on the number of points acquired by a group. The groups were then placed on a leaderboard based on the points acquired so far. The study included a progress bar with four milestones. The milestones were reached when a group could remember and use the collocations from the last week, effectively locking progress behind competence. Bonus cards were utilized as “extra” prizes for perfect completion of tasks and functioned as virtual currency “...which could be used to buy extra time for the games.” The bonus cards also included two special cards, that could be used to double the potential points from a task (Far & Taghizadeh, 2022, p. 9).

The results from their study revealed that the participants' knowledge about collocation improved significantly over the study. Far & Taghizadeh (2023) attributed the result to, among other things, the leaderboard, which allowed participants to track their progress throughout the process. Moreover, tracking their progress made it easier for the participants to celebrate their achievements in learning, and learn while having fun. Interestingly, they argue that competition was also a positive factor contributing to their collocation knowledge (p. 22). In Zhang & Hasim's (2023) review, competition was described as a potential downside to gamified design, which illustrates the need for more empirical research on gamification, and competition specifically.

In addition to improved collocation knowledge, the findings revealed how both groups engaging in gamified content were excited by the activities. Far & Taghizadeh (2023) argue that the gamified setting allowed for the participants to “...tap into their emotions and help them feel the difference between a dull environment and one provoking their excitement.” (p. 23).

Furthermore, the findings revealed that participants were motivated by competition against the other teams, and their own scores. Competition coupled with collaboration towards a shared goal seemed to invigorate the participants to “try harder”. Participants' effort to try harder was attributed to intrinsic motivation, which Far & Taghizadeh (2023) argued stemmed from a desire to do their best for themselves and the teams (p.24).

Flow was also a theory that was investigated in this article. The results from the study reported that the participants were deeply absorbed in the activities, and the challenges were balanced

according to their skills which led to experiences with a flow state. Consequently, Far & Taghizadeh attributed the flow state to the presences of clearly established goals, immediate feedback, balance between challenge and skill, “forgetting” the concept of self, and a missing awareness of the passing of time. Additionally, the importance of teamwork was lauded by the participants and the researchers for its effect on inducing a flow state (Far & Taghizadeh, 2023, p. 24).

To summarize, the research article investigated the potential benefit of digital and non-digital gamification versus non-gamification. The findings revealed increased motivation, increased competence, and an indication that gamification is conducive to achieving a flow state. Thus, this thesis regards non-digital gamification as a valid application of gamification. Moreover, the implications on motivation and competence demand further study. Far & Taghizadeh themselves implore future researchers to further examine the effects of gamified activities on learning language (p. 25).

Motivation

According to Kapp (2012, p. 12), one of the most common reasons for utilizing gamification is motivation. This is echoed by Zhang & Hasim (2023), who found in their systematic literature review that the research goals regarding the use of gamification were related to game-based resources impact on students’ motivation, along with studying students’ attitude to continue using the game-based resource after becoming familiar (Zhang & Hasim, 2023). Previous research intent with gamification is indicative of the perception that game-based resources might serve as effective tools for motivating students and keeping them engaged. Furthermore, motivating actions is indeed a core element of gamification, and sits at the core of this thesis’s research question. Therefore, it is relevant to address motivation, and the theory and literature surrounding it, as part of the discussion on the potential benefits of gamification in an educational context. Motivation is a multifaceted concept, and the concept lives in different fields of study. As such, this chapter explores motivation in the context of education, EFL, and gamification.

Motivation is a complex phenomenon and has been defined in different ways, and in different fields of study. Pintrich & Schunk (2002) defined motivation as "...the process whereby goal-directed activity is instigated and sustained" (p.5), whereas Bandura (1986) defined it by explaining that "Motivation is influenced by one's belief in personal efficacy to produce desired effects by one's actions" (p. 411). Bandura's quote emphasizes the role of self-efficacy, which refers to an individual's belief in their ability to succeed in specific assignments and achieve the desired outcomes. Furthermore, this definition suggests motivation is influenced by the belief that one's actions will lead to the desired results. However motivation is defined, it often relates to reaching a goal. In a way, motivation can be considered the fuel that propels an individual towards a goal. In other words, reaching a goal is made more surmountable by motivation.

To better understand motivation, the concept is usually split into two parts in discussions, intrinsic and extrinsic motivation. Intrinsic motivation speaks to an individual's internal "drive" to undertake an activity. In other words, "Intrinsic motivation is when a learner opens a book and reads for self-fulfillment, not because of some external reward." (Kapp, 2012, p. 52). When the motivation for doing something is the interest in the activity itself it usually relates to an individual's internal or intrinsic motivation. On the other hand, extrinsic motivation is when the individual engages in an activity because it might lead to a reward or a goal. For instance, a student who crams ahead of a test is most likely cramming to achieve a good grade. However, Imsen (2017) points out that both external and intrinsic motivation is built on positive experiences, either in the form of a promised reward or the positive experience of engaging in an activity that entertains or elicits joy (p. 296). Though external motivation may lead to a positive experience from being rewarded, the reward may fall short of the individual's expectations of the reward, i.e., being given a bad grade, despite hours of cramming. Therefore, intrinsic motivation is typically considered the ideal. It is natural to want students to seek out learning based on their own internal motivation, rather than an external motivation (Imsen, 2017, p. 296).

Motivation theories in the EFL and gamification context

Motivation is an essential part of successful language acquisition and plays a crucial role in any type of learning and progression (Gardner, 2010, p. 9). As such, it is no surprise that motivation in the EFL context has been widely investigated by researchers. Consequently, a range of motivational theories have been established to explain student's behavior and attitude towards learning a second language. Although these theories have some key differences, there are

similarities which make them interesting to discuss in relation to the research question for this thesis: To what extent does non-digital gamification enhance student engagement and motivation in an EFL context?

Self-Determination Theory

Self-determination theory (SDT) is a motivational theory that explains human motivation in terms of three basic psychological needs: Autonomy, competence, and relatedness (Kapp, 2012, p. 63). According to self-determination theory, the learner feels motivated when they experience some control over their learning (autonomy). In addition, students experience motivation in their learning when they feel competent in the task they are performing (competence). Lastly, the learner is motivated when they feel connected to other learners or teachers (relatedness).

SDT (Self Determination Theory) has seen research that demonstrates how autonomy, competence, and relatedness are fulfilled in games. Autonomy in a game-context relates to the feeling of being in control of one's choices. Moreover, it is “...the feeling a person has that they are in control and can determine the outcome of their actions.” (Kapp, 2012, p. 63). In other words, the player is in control of his own choices, allowing him to pursue a course of action that *feels* right. Student autonomy is equally significant in an educational context, as outlined in the curriculum; “Pupils who learn to formulate questions, seek answers and express their understanding in various ways will gradually be able to assume an active role in their own learning and development” (Utdanningsdirektoratet, 2017, p. 14). Moreover, autonomy is conducive to promoting motivation in an EFL context as well. For instance, students who choose their own reading material might feel more motivated to read something that suits their interest, perceived proficiency, etc. (Egbert, 2003, p. 505).

Competence in games relates to the challenge, and the feeling of mastery that follows overcoming the challenge. The concepts of competence and mastery can in many ways be considered universal. In game play, this concept might play out as acquiring new skills or abilities to conquer new and more difficult challenges (Kapp, 2012, p. 64). This process is mirrored in education where an individual acquires more advanced competence and

understanding throughout his education. The core curriculum defines competence as: "...the ability to acquire and apply knowledge and skills to master challenges and solve tasks in familiar and unfamiliar contexts and situations. Competence includes understanding and the ability to reflect and think critically." (Utdanningsdirektoratet, 2017, p. 12). A feeling of mastery is motivating, and feeling competent is motivating, which in turn might generate more intrinsic motivation.

Relatedness is a concept in SDT that describes the need to feel connected to others. This concept is easily fulfilled in multiplayer games, where the player engages in play with other players. In an educational setting, the students may feel connected to their peers while learning and undertaking new challenges and tasks. Furthermore, relatedness being an important psychological need is also echoed in the curriculum: "Common reference frameworks are important for each person's sense of belonging in society. This creates solidarity and connects each individual's identity to the greater community..." (Utdanningsdirektoratet, 2017, p. 6). In addition, the Norwegian school is built on social learning, which necessitates cooperation, dialogue, and relationships, all of which may help an individual feel connected to others.

In the EFL context, SDT has been used to underpin the role a teacher plays in creating a supportive learning environment that works to foster students' autonomy, competence, and relatedness (Kapp, 2012, p. 64). Moreover, SDT encourages employing collaborative tasks to enhance an individual's sense of relatedness. Furthermore, differentiation plays a significant role in SDT, as the activities and tasks need to be balanced so that students feel competence when completing them. Gamification can support these needs by providing learners with a sense of autonomy through choice and control over their learning experience, competence through the achievement of game-like goals and challenges, and relatedness through social interactions and collaboration with peers and instructors (Kapp, 2012, p. 12).

Expectancy-Value theory

Expectancy-Value theory argues that motivation is a function of expectancy and value (Eccles & Wigfield, 2002, p. 110). Expectancy refers to the students' beliefs about their ability to perform a

task successfully, while value refers to the students' beliefs about the importance of the task to their goals and interests. In the EFL context, expectancy-value theory attempts to explain the relationship between students' beliefs about their ability to learn English and their motivation to learn the language (Hu & McGeown, 2020, p. 7). Like self-determination theory, expectancy-value theory has also been used to explain and underpin the teacher's role in creating a learning environment that promotes students' beliefs in their own abilities in learning English, and their ability to succeed at the tasks they undertake. However, expectancy-value theory emphasizes how important it is for students to believe in their ability to succeed. Furthermore, it stresses the need to communicate the value of learning English.

A gamified lesson might serve to motivate students by providing them with “game-like” tasks that are familiar in the sense that games and gaming are often a big and familiar part of their life. Familiar tasks might make students feel more confident in their ability to complete the tasks. Moreover, giving students opportunities to utilize their language in a game-like activity could feel both familiar, and engaging because of the inherent fun qualities of games (Kapp, 2012, p. 55). A positive learning environment might also highlight the relevance and value of learning a second language by demonstrating the usefulness of a language spoken all over the world.

Flow theory

Flow theory was introduced by Csikszentmihalyi in his book *Flow: The psychology of optimal experience* (1990). Csikszentmihalyi argued that people feel motivated when they are fully engaged in an activity that is challenging, but not overwhelming. During an appropriately challenging activity, a learner becomes fully engaged in it and loses track of time and self-awareness (Csikszentmihalyi, 1990). This “flow state” requires the activity to include a clear sense of goals and feedback, a balance between skill and challenge and a sense of control over the situation. Egbert (2003) describes four dimensions of flow in an EFL context. Challenge and skill, attention, and control (p. 502-505). Interestingly, the dimensions outlined by Egbert (2003) are like the principles found in games. Entering a flow state in a game-setting is partly why games are so popular, and why they present an interesting opportunity in educational psychology.

The first dimension is challenge and skill. More specifically, it describes the balance between the challenge of a task, and an individual's skills. In other words, tasks need to be balanced in a way

that the individual is always challenged, but never too much. In this way, the individual will likely succeed in the tasks and be motivated to continue (Egbert, 2003, p. 502). If a task is unbalanced, the individual might become apathetic or anxious. The balance between challenge and skill is an important concept in games, and gamification as well.

The second dimension is attention. Egbert (2003) states that “unintentionally focused attention is crucial to achievement of flow.” (p. 504). Focus is perhaps a more accurate description of the functions of attention in this dimension. Focus in a language learning context is different than otherwise. The difference is found in the way language learners concentrate so intensely, which may lead to automation such that they “forget” that they are utilizing a second language, and are instead wholly focused on communicating (Egbert, p. 504). As with the first dimension, the second dimension shares the view that attention and focus is a necessary part of flow with the principles of game-design. A game often demands the attention and focus of its player, moreover, the intense concentration found in gamers might also lead to automation of actions.

The third dimension is interest. An interesting activity sounds more appealing than an uninteresting one, therefore it can be argued that interest is a basic need for flow. However, achieving a flow state does not necessitate an interest in the activity. Finding the activity interesting might make it easier to become deeply involved in the process. Egbert (2003) describes a study where flow-inducing reading was achieved when “subjects often had some prior knowledge of the topic of the text or sufficient interest before reading it.” (p. 505). In other words, the best chance to achieve flow is when employing activities and material of interest to the student. Hence, the reason for utilizing gamification, which aims to educate students by making the activities more fun and engaging.

The final dimension outlined by Egbert (2003) is control. Control is a concept discussed earlier in this chapter, although with a different term, autonomy. Like self-determination theory, control is mentioned in flow-theory as an important aspect of promoting motivation. Naturally, not every activity is of equal interest to all individuals, however, control allows for choice in activity and progression. This process is more likely to promote flow, and motivation, than a controlled environment and activities (Egbert, 2003, p. 505). Interestingly, control or autonomy is an important aspect of game-design as well. Because games are often designed with the goal of

keeping the player continually engaged, the autonomy to control the course of action as a player is necessary to sustain a player's focus and engagement (Kapp, 2012, p. 64).

The concept of flow can also be tied to Vygotsky's theory of *the Zone of Proximal Development* (ZPD). ZPD is a concept that emphasizes the importance of social interaction and guidance in cognitive development. According to Vygotsky, ZPD refers to the range of tasks that a learner can accomplish with guidance and support from a more knowledgeable other (Vygotsky, 1978). The ZPD concept posits that learning and cognitive development occur when an individual works with others who are more advanced in their skills or knowledge. Furthermore, it illustrates the importance of a suitably challenging activity to keep the learner fully engaged in the task (Wood, Bruner, & Ross, 1976). The relationship between challenge and an individual's skill is important in the differentiation of individual learners, and in promoting a state of flow.

Practical design principles for intrinsic motivation

To create a setting in which students feel motivated, there are some design principles to keep in mind. The design principles for intrinsic motivation refers to a method for promoting motivation in instructional activities (Kapp, 2012, p. 57). This method describes four principles to promote motivation through instructional activities. These four principles are control, challenge, curiosity, and contextualization. Like autonomy in SDT, or student contribution in 3.1, "An inclusive learning environment" (Utdanningsdirektoratet, 2017, p. 18), control is described as a principal element of generating motivation in instructional activities. Control in this context refers to student contribution, or control of choices and activities. Allowing students to engage in activities or move on to another task allows them to make choices based on their intrinsic motivation to pursue the activities they find engaging (Kapp, 2012, p. 58).

Challenge is another crucial principle in both education and games. In order for an activity to remain engaging, it needs to remain appropriately challenging. Interestingly, the concept of challenge, and more specifically, appropriate challenges, is considered crucial in most of the theories on motivation that have been outlined so far in this chapter. A challenge can be immensely motivating, especially if accompanied by timely feedback on progression. As part of the design principles for intrinsic motivation, instructional activities are best served by multiple

levels of goals for the student to progress naturally and be continuously challenged (Kapp, 2012, p. 58).

Curiosity can be considered a necessary ingredient to learner motivation. In a constructivist's view, curiosity is part of the driving force to a state of equilibrium. When the child becomes curious as to why it rains, the curiosity might lead to new knowledge. Therefore, it is necessary to spark students' curiosity in order to generate motivation (Imsen, 2017, p.154). Asking curious questions, inviting reflection around interesting topics, highlighting inconsistencies in the students' understanding or utilizing activities that involve or revolve around students' interests are all ways to pique the curiosity of students. Curiosity can be harnessed by utilizing game-based resources as it might relate to the interests of students (Kapp, 2012, p. 58).

Contextualization is the final keyword in this design method. Contextualization refers to the context surrounding the assignment or activity. In a gamification context, it may refer to the "game setting" where the activity takes place. A setting can be fantasy inspired, or it can represent a functional and practical simulation, highlighting the functionality of the activity. Contextualization may help students realize the usefulness of the activity, which might in turn motivate them to complete and participate in the activity (Kapp, 2012, p. 58). Moreover, an exciting context can be engaging.

These four principles are the guiding principles for this thesis' gamified lesson. Although it is not explicitly stated, they echo some of the concepts in other motivation theories, as well as constructivism. Constructivism demonstrates the need for equilibrium and learning by discovery and trial and error. Although constructivism is not a motivation theory, it describes the internal drive individuals demonstrate to achieve equilibrium, meaning a continual accommodation of new knowledge to achieve new and more advanced understanding. This chapter has highlighted theories on educational psychology, games, and gamification, along with theories on motivation. The concepts described in constructivism fit nicely within the context of gamification. Gamification in this case refers to goals, challenge, collaboration, competition, feedback, and storytelling integrated into instructional activities. Gamified instructional activities may follow the design principles outlined above, which in turn could promote intrinsic motivation in students. In other words, it is possible to see all the theories stated in this chapter working

together to create gamified instructional activity that might promote intrinsic motivation in the students.

Task-based motivation in the EFL context

Task-based learning (TBL) is a teaching approach emphasizing tasks as the primary unit of instruction, aiming to promote language learning through meaningful communication in authentic contexts. Skehan (2003) defines a task as “...an activity which requires learners to use language with emphasis on meaning, to attain an objective.” (p. 3). TBL is mentioned in this chapter to illustrate how gamification can have similar effects on student motivation, and because of the study design which utilizes a gamified task to promote engagement and motivation. As outlined above, gamification employs feedback, interactivity, collaboration, and balanced challenges. Some of these concepts are concepts that TBL notes as important for language learning (Skehan, 2003, p. 3-5).

Task-based motivation refers to the motivational benefits that students derive from engaging in authentic language tasks. According to Dörnyei (2009), task-based motivation is a type of extrinsic motivation that arises from the completion of a task or the sense of achievement from reaching a goal. In other words, employing task-based language teaching might make students feel motivated by the desire to complete tasks successfully, and to use their language in a way that feels meaningful and purposeful (p. 1). Willis & Willis (2007) note that task-based motivation is closely linked to the development of a sense of achievement and progress in language learning, which can contribute to learners' self-confidence and willingness to engage in further language learning activities (p. 8). Employing communicative and authentic tasks in EFL teaching context can promote task-based motivation by providing learners with opportunities to use their language in a meaningful and interactive way. Furthermore, communicative tasks ask students to cooperate and communicate in tasks that feel meaningful, relevant, and engaging. Additionally, the collaborative nature of communicative tasks allows students to learn from each other in communication, which might help students co-construct meaning and understanding throughout the process (Taguchi & Kim, 2016, p. 417).

Motivation is a vital factor in any learning process, and as illustrated above, there are a variety of motivational theories that attempt to explain students' behavior and attitudes towards learning. All the theories mentioned above have merit in offering valuable insight into the role of the

teacher and the importance of a supportive learning environment that fosters the student's motivation to learn a second language. Similar in all theories, is the belief that students need to feel confident in their own ability to complete a task, to reach a goal, to achieve new understanding. In the utilization of gamification, feedback and “milestones” are a common way of generating a sense of achievement in the player/student. Feeling a sense of achievement throughout a process may lead to more confidence in their abilities to succeed and learn in the activities. In other words, the “milestones” or the knowledge the student learns during the activity should empower the student to feel more confident in their own ability to succeed (Kapp, 2012, p. 55).

Summary

The literature and theory discussed in this chapter help explain the ways in which educational psychology, motivation theory, and learning theory can be linked to gamification and its benefits. Each part of the chapter has demonstrated and justified the ways gamification can be utilized to the benefit of student engagement, competence, and motivation.

Constructivism describes learning by discovery and the accumulation and assimilation of new knowledge, which are demonstrably present in game-design principles. Learning by discovery in games can be as simple as learning how to move an avatar through trial and error. Moreover, the player is constantly accommodating new information, expanding their knowledge and competence in the game through discovery and progression.

Task-based language learning was briefly mentioned because of its similarities with gamification principles. Namely, feedback, interactivity, collaboration, and balanced challenges. Although there are similarities, the two are separate, however, it is necessary to mention TBL in recognition of their similarities. The practical design methods for intrinsic motivation are partly the guide used to design the lesson which was studied. In addition, the methods referenced four principles that have links to game design principles. All the theories have traits that are similar in game design, which allows for the application of gamification to have a theoretical foundation and justification.

The game design principles outlined in this chapter share similarities with all the theories on motivation mentioned. Not so surprisingly then, the systematic review written by Zhang & Hasim (2023) revealed how the research on gamification so far has demonstrated a positive effect on motivation. Similarly, the research article written by Far & Taghizadeh (2022) found that the participants were motivated by the gamified elements, and their competence in collocation saw an increase after the study. Although not definitive, the articles demonstrated the reported benefits of gamification, and encouraged future research on gamification and its effects. Thus, the concern and research question of this thesis has justification in the field, and the study has been situated within the relevant theory.

Methodology

This chapter describes the research methodology employed in this study, which aimed to explore the engagement and motivation of EFL (English as a Foreign Language) students when they partook in a gamified lesson. The study used a qualitative approach with questionnaire and a group interview as the data collection methods. The following section will give a more detailed definition of each of the elements that were employed to answer this thesis' research questions:

- To what extent does non-digital gamification enhance student engagement and motivation in an EFL context?

Research design

Qualitative research

There are two data collection categories frequently used in a data description, quantitative and qualitative. Quantitative, as in quantity, generally refers to data collection in a large pool of participants. A large pool of participants with a restricted amount of data gives the quantitative method an ability to generalize. Qualitative method on the other hand, is a data collection method that is utilized for a more in-depth exploration of complex phenomena. This is made possible by collecting broad data from a few participants. Therefore, this study utilized a qualitative research design. The aim was to explore the engagement and motivation of EFL students in a gamified context which made this approach more suitable because it allows for an in-depth exploration of complex phenomena, such as engagement and motivation, and has the potential to offer a more substantial understanding of the experiences, thoughts and reflections of the participants (Nunan, 2004, p. 3). Qualitative research method is well suited in a language learning context as well because it lends itself nicely to exploring the experiences of language learners as the data may capture the complexity of language learning in an authentic context.

Case study

The nature of engagement and motivation are complex and complicated, and as such, studies that attempt to investigate these phenomena may utilize a case study to observe participants in real and authentic situations. The case study allows the researcher to explore complex subjects and experiences by observing or taking note of people in authentic situations. A case study is a tool often utilized in educational research because of its ability to allow for generalization of data. In

other words, a case study can be observations of a relatively small group of subjects in an authentic situation which leads to data that can be interpreted in a more broad and general way (Borg & Gall, 1989, p. 402). In the educational context, this could mean conducting a study in a classroom, collecting, and interpreting data, concluding based on the data, and then applying the conclusion found in this specific classroom, to other similar classrooms. However, this “advantage” of being able to apply conclusions to similar situations, is also part of the case study’s weakness. The conclusions drawn from a single study are not necessarily sufficient in generating ironclad conclusions that will ring true every time a comparable situation is replicated (Borg & Gall, 1989, p. 402). However, a case study may reveal trends, which can help to inspire new research on the subject, with new hypotheses to explore based on indicators found in earlier studies. Consequently, the data presented and discussed throughout this thesis will likely indicate the effects of gamification in the EFL classroom, which may lead to more studies into the effects of gamification in an educational context. Thus, the case study was chosen for this thesis to explore the complex phenomena of engagement and motivation that might occur in a classroom.

Participants

The choice of participants was partly out of convenience and based on a choice of age group. Convenience sampling is a type of sampling that is often used in qualitative research that involves selecting participants for a study based on their accessibility or availability, which might make the recruitment process simpler and more straightforward (Dörnyei, 2007, p.129). Approaching a school and a teacher that was familiar to the researcher of this thesis seemed most prudent and convenient. Luckily, the teacher (will be named as Bob, for the purpose of this MA) that was approached was familiar with the “MA process”, having written his own MA in English years prior. This made it easier to communicate the needs of the study and facilitated good cooperation thereafter. Moreover, the experience of having written an MA thesis, and conducted a study of his own made the discussion surrounding this study more fluid. Consequently, Bob and this researcher talked about the study and the lesson, providing valuable insight into the results and his perception of the students’ experience throughout the lesson.

In addition to convenience sampling, this researcher deemed age and proficiency as important variables to consider during the study's planning. Specifically, the lesson demanded a level of

English proficiency not associated with lower grades. The lesson was planned according to the English curriculum to better fit a specific age group, which gives further justification to the choice of age for the participants. The curricular aim that best fit the study's aim and was chosen as a baseline during the design of the lesson, was to "explore and use pronunciation patterns and words and expressions in play, singing and role playing" (Utdanningsdirektoratet, 2019, p. 7).

The participants in this thesis' study were eighteen 7th grade students. The class usually consisted of twenty students, but there were two absentees during the study. At the school where the study was done, there are three 7th grade classes with similar numbers. This grade is unique at this school because of the number of students in each class. It is a relatively big primary school, with grades from 1st to 7th and roughly 520 students. The number of teachers that work with a specific grade varies from the lower grades to the higher ones. For instance, in the 7th grade, three teachers are responsible for one class each. The teacher that participated in this study, is an English teacher, and wrote his MA in English as well. He was an understanding and helpful resource during the study, and his insight into his students proved especially valuable in finding students to participate in the group interview. The participating class consisted of twelve girls and eight boys, and according to Bob, they represented an even distribution of ability and proficiency in different subjects. In the English subject specifically, the proficiency level was relatively high, with some outliers on both ends of the scale. Also, the class was described as a group of social students, with a positive classroom environment promoting participation.

The participants chosen for the group interview were chosen based on recommendations and insights from Bob. Together with Bob, it was decided that two girls and two boys could lead to interesting data, considering the usual demographic for games. In addition to gender, Bob suggested outgoing students who were more likely to engage in the interview process. Afterwards, Bob asked these students individually if they would like to participate. All four students who were asked agreed on the spot. Two of the students were at a high proficiency level in English, and the other two students at a "normal" or expected proficiency level according to their grade. These descriptions are based on insights from Bob, and the descriptors outlined by the Common European Framework of Reference (CEFR). The characteristics of a B1 user fit

with the proficiency level that the participants demonstrated. According to the descriptors outlined by CEFR (Council of Europe, n.d.), a B1 user is someone who:

Can understand the main points of clear standard input on familiar matters regularly encountered in work, school, leisure, etc. Can deal with most situations likely to arise whilst travelling in an area where the language is spoken. Can produce simple connected text on topics which are familiar or of personal interest. Can describe experiences and events, dreams, hopes & ambitions and briefly give reasons for opinions and plans.

In addition to their proficiency levels, two of the students claimed English as their favorite subject, which was an interesting attribute to add to the equation, since the goal of the lesson was to generate a spark of motivation and engagement from the students.

Dörnyei (2007, p. 127) argues that a well-designed qualitative study does not necessarily need many participants to generate rich and informative data to elucidate complex phenomena. Due to the number of participants being only eighteen, the data they generate might be limited in scope. However, the study's intention was to indicate whether gamification could promote engagement and motivation. Therefore, the limited data should be adequate in providing an indication or a "localized" answer to the research question. Although the study might be limited in scope, the potential implications for educational research with a focus on gamification are intriguing.

In addition to the limited number of participants, the study could have benefitted from more cases to study. In this instance, only a single EFL lesson was carried out as part of the study. Because of this, the gamified lesson did not get an edit, or a post-lesson touch up to improve it. Although the lesson plan could have been either extended or built upon, it did not seem necessary to answer the thesis's research question. However, expanding upon this research, and investigating the potential of gamification in the EFL classroom, it might be interesting to alter the research design to be more comprehensive and include more than one case in the study.

Gamified lesson

The data collection was planned around a gamified lesson that the 7th grade class would participate in. Designing the lesson was done by implementing game design principles like character and role-play, storytelling, creative problem solving, special abilities, collaboration, goals, feedback, and balance of skill and challenge. These principles were baked into the activity,

with a fantasy-like backdrop. The lesson was loosely inspired by a simple game system called “Tearable RPG” (drivethrurpg.com). The learning aim for the lesson was for the students to practice their speaking skills and functional language in an authentic and genuine context. The specific competency aim that was chosen as a baseline for the design was: “explore and use pronunciation patterns and words and expressions in play, singing and role playing” (Utdanningsdirektoratet, 2019, p. 7).

The lesson was designed around a group activity. The activity was a storytelling “game”, with a goal of retrieving a long-lost treasure. One student functioned as the “game master (GM)”, which was a role that was a bit more demanding than the others. The GMs’ role was to set the scene for the other students in the group. In other words, the job of the GM was to describe the game world that they were playing in. This also included explaining the challenges that they had to overcome, as well as judge if they were able to overcome the challenge with their proposed solution. There were five groups with one GM each, and either four or three players. The GMs were given a pre-written setting for the group to play in, and the GMs were given instructions on how they could run the setting with their group (Appendix 4). GMs were free to be creative and improvise within the limits of the setting or stay with the script. The groups were decided by Bob because the researcher did not know the students very well.

Students who did not participate as a GM participated as players. Before the activity began properly, the players were instructed to think of three abilities that their character would possess. In the instruction phase, the ability to supernaturally jump was employed as an example ability. These abilities allowed the students to use their creativity and consider how they could overcome challenges using the ability. The three abilities they chose were written down on a small piece of paper. Every time their character used one of their abilities, they had to tear away one letter from the corresponding ability. This interaction made the abilities finite and allowed for more problem solving and strategic thinking in terms of when and how to use the ability. In addition to this, the players would also have to tear away a designated letter from their abilities if they took “damage” from one of the traps or otherwise. When the players no longer had any letters left on their sheet of paper, they were effectively out of the game. When and how the players took “damage” was for the GM to decide. These two rules functioned as the baseline for the entire

game. A challenge was presented, the players utilized their special abilities, or creative thinking to solve the problem, or they “failed”, and took “damage” from their failed attempt.

In practice, the GM would describe a room with a certain environmental challenge or riddle, and the players would attempt to overcome the challenges using special abilities that they chose at the start of the activity, or “outsmart” the challenge and bypass the hurdle without expending a resource. This process involved discussions between the players in the group, deciding how best to proceed, followed by discussions with the GM who narrated their actions. When they succeeded in overcoming a challenge, they proceeded to another room. There were five rooms in total, with four of them being the challenges, and the last one being the treasure room.

The lesson lasted for 1 hour. At the start of the lesson, the first twenty minutes were dedicated to instruction about the activity, information about grouping, and GM selection. During these minutes, the whole class (minus the two students who were absent), and Bob was present. Following the explanation, the individual groups scattered to more secluded areas so as not to disturb each other. Throughout the lesson, Bob and this researcher wandered from group to group to observe and help if needed. After the lesson was done, the students left for the day, but this researcher stayed behind to “debrief” with Bob, taking notes on his observations, thoughts, and the reflections he had done while observing and helping.

Data collection procedures

There are a variety of different data collection procedures associated with qualitative research. The two procedures chosen for the study discussed in this thesis were questionnaires and group interviews. The reason for choosing interview as a data collection method was to further explore the phenomena of motivation and engagement. Based on the complexity of the phenomena, a questionnaire might not be sufficient in answering the research question. On the other hand, a group interview on its own may provide too little surface level information and data to answer the research question, as the participants in the interview consisted of only four students. As such, a questionnaire was included to further investigate the perceptions and insights of a larger set of participants.

Qualitative research method investigates complex phenomena, and complex phenomena can be hard to discuss in any language, therefore it seemed unnecessary, and counterintuitive for the questionnaire and interview to be in English. In order to facilitate free-flowing conversation and reflection, the interview was in Norwegian. A similar logic was applied to the questionnaire. In an attempt to minimize potential confusion or misunderstandings, the questions and answers were written in Norwegian.

Group interview

Group interview is a data collection tool that involves two or more participants who share common experiences or characteristics. In an educational context, this could mean a group of student classmates that are interviewed about their experiences in school, or it could be a couple of English teachers being interviewed about their experiences as English teachers. Group interviews differ from a standard one on one interview in the sense that the power relationship and perceived distance is minimized because of the natural support found in a group (Frey & Fontana, 1991, p. 185). This natural support might also lead to the interviewees being more honest in their responses, which is important to generate the most accurate data. This may be even more important when the interviewees are young children, who might have a natural tendency to be “respectful” of the adult by not necessarily expressing their honest opinions.

Although group interviews are effective tools to utilize in gathering data, there are some inherent disadvantages associated with the process as well. First, the dynamic of the group being interviewed can present a challenge. If the interviewer is aware of the dynamic of the group, it might alleviate some of the unpredictability, but if the interviewer is unaware of the dynamic and has no real relationship with the group, it becomes more difficult. The dynamic in a group interview can influence how the interviewees respond to questions and how they react and respond to each other's answers. Worst case, the group dynamic grinds the interview to a halt. This issue can potentially be resolved if the interviewer is familiar with the individuals that make up the group, and the dynamic between them. Furthermore, to resolve this issue, an interviewer needs to function as a sort of moderator, making sure every participant in the group is allowed and willing to share their reflections and answers (Dörnyei, 2007, p. 145).

The study utilized an informal approach to the group interview. An informal approach to an interview includes guiding questions (Appendix 1), without a word for word requirement to their

phrasing and order. Moreover, the interview guide was designed with open-ended questions to facilitate reflection and discussion among the interviewees (Dörnyei, 2007, p. 137). One of the benefits to employing an informal approach is the organic and spontaneous expressions and reflections that might occur when the structure is informal and flexible. Furthermore, the dialogical nature of the interview allows for knowledge, understanding and reflection to be co-constructed throughout the interview between the interviewer and the interviewees (Postholm, 2017, p. 71). Utilizing an informal structure in the interview allows for the interviewees to reflect in the moment, and construct understanding and thoughts surrounding the questions being asked by the interviewer. For this thesis's study, an informal structure allows the students to reflect on the nature of engagement and motivation in the classroom and how a lesson's structure might enhance or be a detriment to these phenomena.

Despite the informal approach and the flexible nature of the interview process, the interview lasted thirteen minutes. The interview was recorded using the microphone on a laptop, and the microphone on a phone in case of technical errors. The recording was done with the "Diktafon" app associated with Nettskjema.no. The interview followed an interview-guide, consisting of five questions (See Appendix 1). These guiding questions were intended as starting points for reflection and discussion among the participants, and potentially the interviewer. Therefore, the questions were formulated in a simple and straightforward way, to allow for follow-up questions based on their responses.

Questionnaire

A questionnaire is a data collection method often used in quantitative research. However, it can be used in a qualitative study depending on the questionnaire's design. This tool is used to gather various data from participants on different topics. One of the main reasons for employing a questionnaire in a study is to examine and discover characteristics of a group of participants. Most questionnaires utilized in qualitative research are designed with open-ended, or "attitudinal" questions. This allows for data that might illustrate what the participants think of certain subjects, including their attitudes, opinions, and interests (Dörnyei, 2007, p. 102). Part of the advantage to utilizing a questionnaire is the standardization of questions. Standardizing questions can allow for the participants in a study to answer the exact same questions, which

helps to minimize variation in responses. Additionally, it might help to boost the reliability of the data because of the lack of variation in questions (Mackey & Gass, 2015, p. 161).

Questionnaires also allow for anonymity in answering questions. The anonymity of participants is crucial for a study to be ethically sound. In addition to ensuring the ethics of a study, anonymity might help participants to answer questions honestly and openly. In other words, anonymity may sidestep some of the potential difficulties with data collection methods such as interviews, where the social dynamics can play a part in how the participants respond to questions.

There are some disadvantages to using a questionnaire that this study needed to consider. First, the questionnaire offers little depth in the questions that are asked. Usually, they do not allow for follow-up questions or clarification to answers. This can limit the richness of the data the questionnaire collects (Mackey & Gass, 2015, p. 161). Second, the questionnaire is limited in portraying and capturing participants' experiences or perspectives because of the limited questions asked. A questionnaire presents pre-written questions for the participants to answer. However, these questions do not allow for adaptation in response to an answer in order to further explore the wider context of the participants' answers (Dörnyei, 2007, p. 105).

The reason for employing a questionnaire in this study was to gather more generalized data from the students who participated. Generalized data in this case refers to their overall opinions of both English as a subject as well as how a gamified lesson was perceived and experienced. In addition, the questionnaire functioned as a supplement to the potentially limited data that a group interview provides because of the number of participants. The research question demanded data from more participants too, to help generate generalized conclusions about EFL students and the lesson's experience.

The questionnaire consisted of five questions. The participants were given a link to the questionnaire, which was done digitally on "Nettskjema.no". Two of the questions were open-ended, which allowed participants to write their answer (Appendix 2). The remaining three questions were closed and had two or three pre-written answers for the participants to choose from. E.g., one of the questions asked if the participant enjoyed the activity, and the response they could choose from were yes, no, and a little bit.

Analysis

Two sets of data were collected. Eighteen students were present for the lesson, and eighteen students answered the questions on the digital questionnaire. Four students participated in the group interview. The interview and the questionnaire were saved to “Nettskjema.no”, where the participants responses were stored. Consequently, there were two sets of data that were analyzed. Because the interview was carried out in Norwegian, it was deemed unnecessary transcribe and translate. Therefore, the audio from the interview was processed through listening with headphones. The data from the questionnaire was automatically processed to an extent, by “Nettskjema” functionalities.

The benefit of employing closed questions is the readily available data that can be quantified (Nunan, 2004, p. 145). On the other hand, open-ended questions present a more taxing analysis. However, this study formulated no more than two open-ended questions in the questionnaire, and three closed questions. The presentation of the data from the questionnaire was split into two parts, open-ended questions, and closed questions. To start, the open-ended questions were presented, with the presentation of the closed questions afterwards. The percentages generated by the closed questions were organized into a simple graph by “Nettskjema” and utilized in the presentation of the data.

The interview data was presented chronologically, according to the audio recording. As mentioned, the audio was processed by listening to the recording with headphones, and not transcribed. Because of the data being in Norwegian, the quotes and paraphrasing were translated for the purpose of the presentation.

Validity and Reliability

As mentioned, the chosen method for the study is a case study. The study's nature relates to a single case too, making it harder to construct validity and reliability for the research design (Nunan, 2004, p. 79). However, the study is causal in its investigation, and therefore, internal validity becomes important. Specifically, it is important to consider whether the results of the gamified lesson led to more engagement and motivation, or if there were other factors involved that were not considered (Nunan, 2004, p. 80).

Internal validity was considered in the design throughout. Firstly, the English teacher, Bob, provided observational information combined with experience and relationships. Bob knows his students, therefore, his observations on student engagement made the data from both the interview and questionnaire more trustworthy. However, the notes and conversations with Bob have not been included as data and do not fully account for the design's validity. Secondly, the questionnaire presented three closed questions, and two open-ended questions. The closed questions were intended to construct a baseline for the participants experience with the activity, while the open-ended questions were intended to allow for more insight into student experience. As such, the goal was for the baseline to support the statements made in the open-ended questions, allowing for a more stable evaluation of their responses, and the causal effect of the activity. Thirdly, the interview had a similar function to the open-ended questions in the questionnaire, namely, to allow for more depth in the data, leading to potentially more safe assumptions that the activity generated the effects reported in the results (Nunan, 2004, p. 81). Lastly, the study's concern of the motivational benefit of gamification is like other studies mentioned in the thesis so far (Zhang & Hasim, 2023., Far & Taghizadeh, 2022). In other words, this study investigates a phenomenon that has been observed as a consequence of gamification previously in other studies, making the data from this study more predictive.

In terms of reliability, the activity employed in the study is included as an appendix, and easily reproduced. In addition, the simplicity of the questionnaire and interview guide can be considered a boon in replicating the study, because few questions may lead to less variation in results. Furthermore, because the study's investigation concerns phenomena that have occurred because of gamification, the reliability of this study might be strengthened in light of the results from similar studies that have demonstrated positive results. Eighteen participants in a questionnaire can be considered a limitation. Such a small number of participants makes the study fairly limited in its scope. However, a qualitative case study does not necessarily need many participants to provide insight and hint at trends.

Ethical considerations

This thesis's data collection process was carried out according to "Norsk Senter for Forskningsdata"(NSD) rules and regulations. In the beginning stages of the study, an application was sent to NSD to ensure that the data collection process would be ethically sound. The study was approved shortly thereafter. Every participant's participation was made anonymous by

excluding names and the school they attend. Similarly, the participants are referenced in the thesis anonymously to protect their identities and personal information. In addition to keeping the participants anonymous in the text and data collection, the study could not proceed without their consent to participate in the study. Furthermore, the participants are young children, which means that consent must be provided by both parents and children alike (Norsk senter for forskningsdata, n.d.). Informed consent was gathered for the study by e-mailing parents a consent form with all the necessary information. This consent form was made with a template provided by NSD (See appendix 3) and sent to parents by the participants contact teacher. In addition to a consent form, the students were informed at the start of the lesson what to expect, and that participation was not mandatory. Moreover, it was made clear for the students that not participating in the study was completely optional, and if they chose not to participate it would not affect them in any way.

The group interview required some ethical considerations as well, because of the perceived “institutional power” of the researcher, who is a male adult with an “authority” that stems from both the functional authority of a teacher, as well as age. The four participants in the interview were informed that they could be completely honest in their responses, and not overly polite in their response. Moreover, the anonymity of the interviewees, and the interview process was outlined before the interview began.

Results

In this chapter, the data gathered in the study will be presented. As mentioned in the previous chapter, the study utilized a questionnaire and a group interview. Through these two methods, the study attempted to investigate to what extent non-digital gamification enhance student engagement and motivation in an EFL (English as a Foreign Language) context. Both data collection methods were carried out in Norwegian, therefore the data is written in Norwegian. Consequently, this results chapter will discuss the results using translated responses from the participants, translated by this researcher. The chapter is divided into two parts, first the results from the questionnaire, and the second part is dedicated to the results from the group interview. It should also be mentioned that the participants were informed before the lesson began what gamification was. All participants finished the activity, reaching the final treasure room, and zero participants were removed from the game due to sustaining too much “damage”. Thus, the responses from the participants are all based on experiences from the finished activity.

The questionnaire contained five questions (Appendix 2), with two out of the five questions being open-ended questions, while the remaining three were closed questions with pre-written answer options for the participants to choose from. This chapter will begin with the open-ended questions first, describing and demonstrating the results found in the participants' written answers to the questions. Afterwards, we move on to the closed questions' results from the questionnaire.

After the questionnaire results, the interview results are presented. The interview style utilized was a group interview with an informal approach and interview guide. The interview guide (Appendix 1) contained five pre-written questions, however, due to the informal approach, improvisation and spur of-the-moment reflections were encouraged.

Questionnaire

"What did you think of this lesson"?

Two open-ended questions were focused on the lesson's enjoyment and the activity the participants took part in during the study. Formulating the questions in a way that was true to an open-ended question made it possible for the students to articulate what they liked or disliked in

more words than a simple yes or no. The first of the two questions asked what they thought about the (gamified) lesson. Sixteen out of eighteen participants reported that they enjoyed the lesson, while two of the participants said they did not enjoy the lesson. Twelve out of the sixteen respondents who reported that they found the lesson to be engaging utilized unambiguous language to convey their thoughts. Responses like: “I thought it was a fun lesson. We learned English but in a fun way” or “I thought it was fantastic, I loved it, especially when you love board games/role-playing games is this perfect for learning English and speaking English, being social and having fun with role-playing, it does not get any better than that.” are both examples of unambiguous language in appreciation for a gamified lesson.

On the other hand, there were responses that employed less clear-cut language, and in doing so, their responses conveyed a more tepid positive experience. Responses like: “It was kind of fun because you could talk to the others while you worked and spoke English at the same time.” or “I thought it was OK, kind of hard to understand. But it was cool to do something else in an English class.” or “I thought it was OK. I liked that we played but I did not understand the rooms, it was a bit hard to follow.” These responses, although not purely negative or positive, reflect a slight engagement and enjoyment. However, they also point towards a lacking instructional phase from the researcher's side.

There were two responses that reflected disinterest in the activity, and a confusion surrounding the lesson's “point”. Responses like: “I did not think it was very fun, and I did not learn anything either.” or “I did not understand the point of it all. And I thought it was kind of boring.” Both answers communicate a lack of engagement and enjoyment throughout the lesson. Moreover, one of the respondents report not understanding the meaning or point of the lesson. Not knowing why something is being done in the classroom can be confusing and may lead to a lack of motivation to proceed. Understanding the purpose and goal of an activity may help boost engagement in a classroom (Kapp, 2012, p. 12).

Finally, there were answers in the questionnaire that conveyed an appreciation for doing something different in an English classroom. Responses like: “I thought it was exciting to try something new. Also, it was really fun.” or “I thought it was fun because we got to do something other than just write and do tasks.” or “I thought it was fun, because it was different than the usual English lesson.” help to demonstrate some excitement in doing something different in the

classroom. Furthermore, it might hint to the kind of lessons they usually attend, where they write and do various assignments.

"What did you like/dislike about the activity?"

The second open-ended question asked the respondents: "What did you like/dislike about the activity?" This question gained similar responses as the first open-ended question. The same number of participants that were positive to the activity in the responses from the last question reported similar reflections in the second one. However, the intent behind this question was for the students to reflect and formulate what they liked or disliked, not whether they liked it or not. This generated responses like: "I liked that it was fun and educational at the same time." or "I liked that we could use different abilities to move forward in the activity. I also liked that we got to speak English." or "I liked that it was sort of like a game where everyone got to help and participate. What I did not like as much was that I did not always understand what the Game Master (GM) was saying." or "I enjoyed playing a game in English that made me feel engaged, I also liked that you could speak English." Similar responses to the question express a positive attitude towards gamified activity. Interestingly, seven out of the eighteen responses, speak of the activity as a game, not as an English lesson. Moreover, ten out of the eighteen participants recognize a link between playing the game, and practicing their English. Responses like: "I liked that I got to learn English in another way than the usual." or "I think we can do it again because there was a lot of oral activity." are indicative of an understanding between the learning that might derive from a gamified activity.

One of the goals for the lesson was for the students to have fun while engaging in dialogue, discussions, and play in English. Ideally, this would lead to an authentic context of conversational English, allowing the students to practice their functional language. This goal is reflected in the responses from the questionnaire, where the students report fulfillment from being able to speak English in an English lesson. Responses like: "I enjoyed playing a game in English that made me feel engaged, I also liked that you could speak English." or "I loved it because I love role-playing games, they are my favorite, although board-games are fun as well. The activity was especially a perfect match for me because we got to speak English to each other." or "I liked that we could speak English and that it was a fun game. I hope we can do it again sometime. I also hope we could choose our own abilities next time." can be viewed as an

indication that the students experienced a scenario where they could use English in an authentic and functional way, to simply play the game.

Other responses to the question indicated more difficulties with the activity, and especially the difficulty of understanding the progress of the game, and the descriptions by the GM. Responses like: “Did not understand.” or “I liked that it was something we had never tried before. But it was difficult to understand.” illustrate some frustration felt around the difficulty of the activity.

“Enjoyment, motivation, and novelty.”

Moving on from the open-ended questions to the closed questions, we examine data that does not allow for the same amount depth. However, the closed questions formulated in the questionnaire allow for raw numbers in the data to attempt to answer the research question: How game design principles in an EFL lesson can promote engagement and motivation in young EFL learners. To that end, the closed questions asked in the questionnaire were as follows:

The first question, “Did you enjoy the activity?”, saw results that mirror the first open-ended question that asked what they thought of the lesson. Twelve out of the eighteen participants responded with “yes” (Ja) on whether they enjoyed the activity, while four others responded with “a little” (Litt), and the remaining two responded with a “no” (Nei). Similarly, in the first open-ended question, twelve out of eighteen communicated that they enjoyed the activity, while four communicated a less enthusiastic, or unequivocal enjoyment, while the remaining two made it clear that they did not feel engaged (Figure 1.)

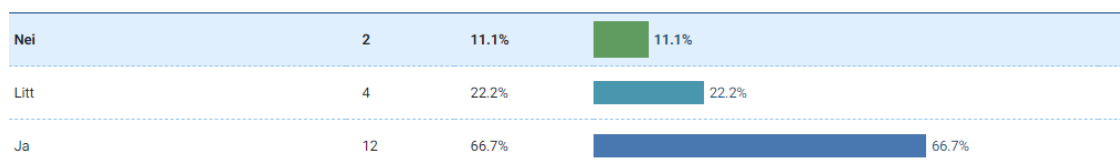


Figure 1.

The second question; “Did you feel motivated to succeed in the activity?”, delved into the meat of the research question, which was whether gamification had any effect on the participants

motivation to succeed in the activity. Despite having three answer options to choose from (Figure 2.), the entirety of the responses landed on either a “Yes” (Ja) or “a little” (Litt). This data differs from the others presented so far, in that the response is almost split. Moreover, the data indicates that all participants experienced some motivation and desire to succeed in the activity. Interestingly, the participants who expressed their disinterest in the activity in the first question still felt motivated during the lesson. With zero participants opting for the “No” (Nei) response, it appears that all the participants were engaged in the activity at some point.

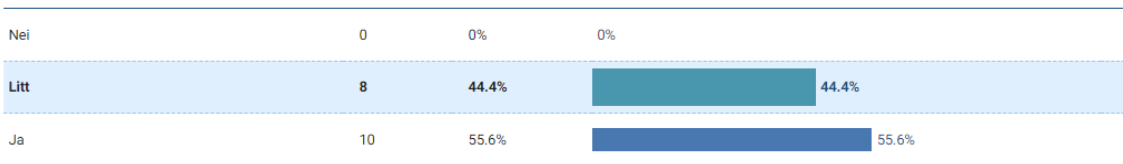


Figure 2.

The third and final closed question; “Have you ever done any activities similar to this in school before?” seeks contrasting data, to extract whether the participants are familiar with alternative lesson design in the English classroom. There were only two options for the participants to choose from in this question, “Yes” (Ja) or “No” (Nei). Sixteen out of the eighteen participants said they had never done anything similar in school, while the remaining two said they had. This result speaks to the novelty of gamification, and the use of game-based elements in a non-game-based context. In other words, gamification is not a tool frequently used in this grade.

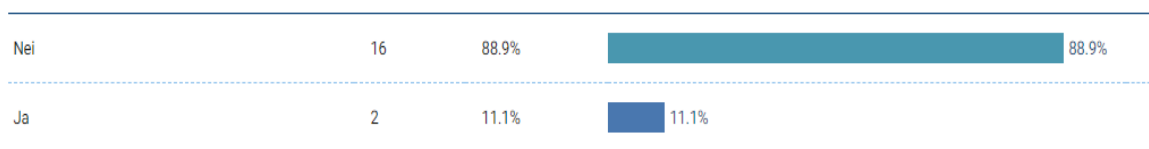


Figure 3.

The results from the questionnaire helped to shed some light on the research question. The closed questions provided some figures on the experiences of the participants. Although the questions allowed for mostly surface level data surrounding their experience with motivation throughout the activity, the responses allow for speculation, reflection, and perhaps most importantly, indicate a trend among the participants. The open-ended questions provided some insights into

the participants thoughts and reasonings for why they liked/disliked the activity. Moreover, the open-ended questions gave the participants an opportunity to express their thoughts surrounding the activity, which led to interesting responses that help inform the discussion and consideration surrounding the research question. Lastly, the intent behind the questionnaire was to supplement the data gathered from the group interview, which was meant to allow for a more in-depth exploration of the phenomenon of motivation. In other words, the results from the questionnaire, although interesting on their own, provide limited data to answer the research question. Therefore, before delving into a more comprehensive discussion and exploration on the research question, the chapter moves on to the group interview results.

Interview

The interview method chosen for this study was a group interview with an informal structure. With an interview guide (Appendix 1), this researcher interviewed four students to explore their experiences with the English subject and their motivation for learning and achievement in the classroom. The interview lasted twelve minutes, with all the students participating in the conversation. As outlined earlier in the thesis, both data collection methods were carried out in Norwegian, therefore, this part of the chapter presents translated quotes and paraphrasing from the interview as part of the results. Also, to make the interview results more understandable and easier to follow, the interviewees will be assigned alphabetical letters in order of appearance.

First questions – Opinions on English as a subject and opinions on common English lessons and assignments

At the start of the interview, the interviewer asked the students about English as a subject. Student A was quick to respond that: “English is quite fun when I feel a sense of accomplishment, especially when I feel like I’ve learned something new.” Student B continues, explaining that “it’s pretty fun, so long as the tasks are not too difficult. If the topic at hand is something I am familiar with, it makes it easier and more fun. Also, I think the subject is a lot more fun if we do other things than we normally do. Usually, we just do normal grammar worksheets.” Both student A and B explain that English as a subject is most engaging when they feel they are able to succeed in the tasks. Moreover, student B makes it clear that motivation is most easily found when there is variation in the tasks they are given in the subject. Student C continues the conversation by adding that English is their favorite subject in school, because of

how you can utilize what you learn in school; "...you can communicate with other English-speaking people, and you can even practice English by speaking to yourself." Following Student C's comment, student D adds that: "it is useful to learn difficult words in English, so that when the time comes to communicate with English speakers, you know all the words. This is especially useful when you play games online and meet players from other countries." The first question establishes that the participants are all interested in the subject and enjoy and see the value of learning English. Furthermore, the responses reveal that the students appreciate lessons that have suitably difficult tasks and are varied in their content.

Because of the responses from the interviewees on the first question, the interviewer investigates further by attempting to establish how the participants view their usual English education, i.e., what an average English lesson entails. Three of the students (A, B & C) explain that lately they have been working with grammar worksheets, where they practice their grammar in written tasks. In addition to their worksheets, it is also common that they learn about an English-speaking country from their textbook, or the internet. Furthermore, learning about an English-speaking country often involves reading about them from the textbook, and constructing a presentation or a product, describing and presenting the country.

When asking the students further about whether these kinds of activities and tasks have been prevalent in their education, they agree to an extent, but add that there have been other types of activities as well. Student D chimes in to explain a different type of lesson that was engaging: "Not long ago, we had a task where we were supposed to write a sci-fi story. We had to write 500 words, and unfortunately not everyone managed to finish...". When asked how the students feel about creative writing activities, everyone is eager to respond. All four interviewees explained how creative writing assignments are the most exciting tasks. Both students B & C are keen to explain how creative writing keeps them engaged, and how creative assignments in general are the most exciting tasks that keep them motivated to learn. Moreover, student A adds that part of why these types of assignments are enjoyable and engaging, is because they are allowed to listen to music and sit on comfortable sofas, making it easier for them to "get lost" in the work.

Second line of questions – Thoughts and reflections on the gamified activity

Following the interview guide, the interview moves on to the second line of questions. These questions allowed for the students to reflect in real-time, with each other, about the gamified activity. All four students explained that the activity was fun and engaging because it was out of the ordinary. Student B argues that the most motivating activities in school are *new* and fun activities; “Doing new and fun activities makes learning more fun and makes it more motivating to learn. Usually, you feel more motivated to learn when the activity is something more interesting than, for example, write 100 or 200 words about *have* or *has*. It’s just more fun when the activity is more engaging.” Interestingly, all four students explained their opinions on the gamified lesson by contrasting it with regular English lessons. Student D added to the discussion that games are familiar and fun for most of the students in their grade, and by allowing them to play in school, they were able to learn in a somewhat familiar problem-solving arena; “I thought it was really fun, because I like to play games with classmates in my spare-time. So, when you are immersed in a game at school, and get to play in groups, it was really fun and a new experience too.” Based on the responses from this line of questions, it was made clear that the participants usually enjoy themselves when an activity is new and exciting. Additionally, they feel more motivated to work when they get to play and be creative.

Continuing the conversation about their experience with the activity, the interviewer asked if the students felt motivated to participate and learn during the lesson. To this, student D explained that the activity actually was motivating, and student B was quick to interject that: “I, at least, felt very motivated to play and practice English, but I’ve always enjoyed English as a subject.” After student B’s interjection, the other three nodded in agreement, but did not add anything else.

Third line of questions – How would you change the activity?

In the third line of questions, the interviewer inquired how the activity could be changed for the better. Changes in this context could mean a variety of things, namely; balance the abilities the players could choose from to make the game either harder or easier, or simply make the rules, descriptions, instructions, etc., more understandable for the students. Although not a pre-written or pre-considered question in the interview guide, the interviewer recognized that an activity can always be improved, and the suggestions from the participants may give an indication of what students consider to be motivating in the classroom. Their responses, although limited, conveyed a desire for creativity and freedom. Moreover, in conversation with the interviewer, the students

agreed that creating their own story/game setting and rooms with different challenges, would allow them to practice their English more and would be a fun challenge. In other words, the students wanted an opportunity to use English in creative group assignments.

Fourth question – A summary of experiences in relation to RQ

At the very end of the interview, the interviewees' focus and attention was waning. Therefore, the interviewer decided to close out the conversation by asking them their thoughts on how and if gamification can help to engage and motivate EFL learners. In response to this, Student D summarized the experience by saying: “It was a nice experience, we learned something new, we had to solve problems and do tasks without simply writing X amount of words, so I think it was quite fun.” Following this summary, student B chimed in by explaining how gamification (the term was explained to the students beforehand) can have a positive effect on how students think of English as a subject; “Instead of thinking oh no it’s English, they will think oh yeah, it’s English!” Student B continued by arguing that it is easier to feel motivated in school when you are having fun.

This concludes the chapter on the results, which leads to a discussion of their implications in the following chapter.

Discussion

In this chapter, the results are discussed in light of the theory and literature outlined in the thesis. The intent of this chapter is to consider the positives and negatives experienced by the participants, the implications of these experiences, hint at trends, and lastly point to potential future research in this area. This chapter will include considerations on the study's limitations, and how it might have affected the results, and how potential future research might address them and find new and more substantial data as a result. Throughout the chapter, there will be references to the literature and theory review to answer the research question: To what extent does non-digital gamification enhance student engagement and motivation in an EFL (English as a Foreign Language) context?

Limitations

There are certain limitations associated with the case study, as discussed in the methodology chapter. Generalizing the results from a single case study can be interesting and can even generate new ideas on the concept being generalized, however, because of the scope of a single case study, the results are not necessarily conclusive, and some might argue un-generalizable (Nunan, 2004). Barring these limitations, the responses from the eighteen participants in the study were almost unanimous; the gamified lesson was engaging and fun. Sixteen out of the eighteen participants responded positively to the activity, and twelve of the eighteen reported enjoyment with unambiguous language. At the very least, the results demonstrate the participants' joy and engagement when participating in creative and out of the ordinary activities. However, the results from this study do not ensure the same results in another similar study. Although the results from this study demonstrated that this activity led to engagement, other factors and other participants might change the outcome. For instance, the interview, although a group interview intended to promote a "safe space" for the participants to speak their minds (Frey & Fontana, 1991), the participants did not engage in as much free flow reflection as was predicted. In other words, an interview with other participants might lead to more reflection and co-construction of meaning and knowledge (Postholm, 2017). Other participants might present with different interests, which might also influence the results further. Moreover, a more experienced interviewer might also generate more reflections through more confident and solid moderation (Dörnyei, 2007).

In hindsight, this study's data collection tools present problems due to the questions in the interview and the questionnaire. Ideally, there would be more questions to further investigate the participants' experience with flow, and more specific questions on the relationship between the mechanics of the activity and their perceived motivation to succeed in the challenges. Thus, this study suffers from a lack of adequate, and more thoughtful, questions. However, despite this, the study has generated interesting data, that allow for reflection and discussion on the potential implications of the results.

Engagement & Motivation

The positive responses reported engagement based on, among other things, the activity allowing for creativity and expression. These aspects of the activity might have been enough to generate engagement from the students, however, it is also likely that Kapp's (2012) definition of a game is applicable when considering these results; "...a system in which players engage in an abstract challenge, defined by rules, interactivity, and feedback, that results in a quantifiable outcome often eliciting an emotional reaction." The activity the students participated in (Appendix 4) presented a system to engage in, challenges defined by some rules, and the opportunity to interact with the setting(world), and the immediate feedback from the Game Master (GM), and according to the responses, this led to an emotional reaction, in this case enjoyment and engagement. Although the reason for their enjoyment might be creativity and expression, it does not subtract from the benefits they experienced from the gamified principles that were applied (Kapp, 2012).

In addition to positive responses in the study, there were responses that reported their enjoyment in a more tentative language. One potential reason for these responses being less clear-cut could be reports of being unable to fully understand every part of the game. The two responses that communicated a negative activity experience reported difficulty understanding the game and a lack of engagement due to not seeing the activity's point. Self-determination theory (Kapp, 2012) describes the relationship between competence and motivation, specifically how when a student feels competent in a task, they are more likely to feel motivated to complete the task. This theoretical viewpoint is reflected in these responses. Difficulty understanding a task can be mitigated by a more thorough instructional phase where the teacher ensures that every student is on the same page. In reviewing the responses in the questionnaire, this fault is made clear in the responses who report frustration about not understanding, or the difficulty of the activity.

Although not explicitly stated, a potential reason for the lack of engagement might stem from a lack of interest in the activity's context. Interest is described as a key component of motivation and increases the likelihood of achieving a flow state (Egbert, 2003). Although there are only three responses in this vein, it reflects the need for thorough instructions at the start of an activity, and potentially the importance of appealing to student interests. In addition, time to provide solid instructions may have been lacking when students report not understanding the activity. One might consider the responses as a reminder of how easy it is to lose the interest of students when they are unable to follow the activity, and even more so if the activities are uninteresting.

Examining the results in the lens of Self-Determination theory (SDT), the findings reveal the appreciation felt towards being able to work together with their peers. A reported reason for engagement in the data set was the fact that the students appreciate “relatedness”, or working together to overcome the challenges they were facing in the activity. Moreover, the appreciation for cooperation was linked to their appreciation of utilizing language in a collaborative and authentic way. A context of a group of students playing a game together, using their language to best traverse challenges, can be argued is an authentic communicative context, where language is a tool for collaboration, negotiation, and mastery in the game. In addition to relatedness, the responses indicate that the students desired even more autonomy. Meaning, the students reported an interest in engaging in the activity again, but with more choice and freedom. A response reported a desire to have more choice in choosing a special ability, another response during the interview, explained how creating their own “game” setting could be a fun way to build on the activity. Finally, the concept of competence in SDT was also reported as a significant motivator. Especially, in the interview was it made clear that the students appreciate English as a subject when they feel a sense of accomplishment, or if the tasks are not too difficult, and they are familiar with the topic they are working with (Interview results, First questions). Moreover, there were responses that explained how motivating it was to learn through play, because games represent a familiar arena for trial and error and learning by discovery (Kapp, 2012). However, competence remains the aspect of SDT that saw least mentions. This might be due to the interview and questionnaire questions not directly asking these questions.

Collaboration was described as an important piece of game-design, and gamification (Kapp, 2012). In this study's case, the results indicate that the students enjoyed the opportunity to work together in a gamified context. Moreover, the students were especially encouraged by the opportunity to utilize oral English in a task, and in cooperation. Discussions on the solutions to the various challenges they met with, encouraged authentic and functional language to best communicate their ideas for overcoming the challenges. And considering that every group managed to overcome every room, it indicates that the theoretical benefits collaboration has on problem-solving, was realized to some extent in this instance (Dicheva et al., 2015). In addition, Task-Based learning (TBL) posited that authentic and communicative language tasks would be beneficial to motivation, and based on the findings from this study, there appears to be some truth to this in practice (Skehan, 2003).

Perhaps the most significant data from the questionnaire are the answers to the closed question; “Did you feel motivated to succeed in the activity?”. The responses to the question read as almost a fifty-fifty split between the answer “Yes” or “A little”. Working solely from this response, would lead to a simple answer to the research question; gamification leads to real motivation in around fifty percent of students, while the remaining percentage of students feel a slight motivational boost. However, basing a conclusion solely on this question would be erroneous in the context of an MA thesis. Thus, in further attempts to investigate the RQ, it seems necessary to consider all aspects of gamification utilized in this study, and their reported effect on engagement and motivation.

Novelty

Although the theory on the effects of games on motivation and engagement is in line with the responses discussed above, the reported reasoning for enjoyment could also indicate the participants' view of new and interesting activities. In other words, the novelty of the activity can be a reason in and of itself for the positive responses. Several of the responses describe the activity as fun because it was different from their “standard” English activities. This argument was echoed in the interview too. Three out of the four interviewees told the interviewer that the activity, and potentially similar activities, would be/was fun because creative group activities are more enjoyable than “...simply writing X amount of words...” (Fourth question, results chapter).

This implies that the Expectancy-value theory, which states that the perceived value of a task influences student motivation, has merit (Eccles & Wigfield, 2002). In other words, the student's perception of the activity's novelty might have influenced its perceived value, and subsequent engagement and motivation. Conversely, the participants who did not understand the point of the activity, or had trouble understanding aspects of the rules, had more trouble seeing the value of the activity, leading to a loss of motivation in the task.

Balance

Every participant group managed to finish the game, without any player being reduced to “zero abilities”. This would indicate that the balance of challenge and skill was appropriate, leading to everyone finishing the activity. However, as mentioned above, there were responses that communicated frustration with the difficulty of the game, which leads to conflicting conclusions that need to be discussed. The activity was organized around group work, meaning the participants would support each other, and collaborate to overcome the challenges presented in the game (Dicheva et al., 2015). However, the nature of group work does allow for an individual to be “carried” through the challenge, meaning that a student could perceive the activity as difficult and confusing, while still being part of a group that manages to finish the game. Ideally, this collaborative effort would lead to co-construction of knowledge (Taguchi & Kim, 2016), and teamwork, but the responses indicate that this did not happen for these particular students. The implication is that these students did not feel engaged in the activity due to insufficient feedback and instructions to experience competence in the activity, and in those cases, balance of challenge and skill might have been off too. Although there is no way to tell whether these students would have been more motivated if they felt more competent in the activity, however, based on the other participants’ responses and the theory outlined, it is a fair assumption.

Game Master & Storytelling

Another aspect of the study that influenced the findings was the student led game structure of the activity. The Game Master (GM) role was a more demanding role than a regular player, as described in the methodology chapter. Despite the GM guide (Appendix 4) that was handed out and explained to the GMs, some of the responses from the questionnaire reported some difficulty understanding the narration by the GM. These responses reflect the risk of saddling an individual student with the responsibility of a GM. On the other hand, the autonomy and creative expression that a student GM represents for the activity was also realized. Meaning, despite a

guide to the progression of the setting, none of the “games” played out the same. This fact, coupled with the choice of special abilities for the players, made it possible for the students to create their own “story” in collaboration, and be creative in their solutions and narration.

Storytelling is a key aspect of games and can be a valid principle to apply in gamification. In this study however, storytelling did not have much reported benefit. Although one could argue that the setting of play that the participants interacted in represented storytelling, it took on a smaller role in this activity. However, if one were to expand on the activity, storytelling could potentially allow for new avenues of gamification and engagement (Kapp, 2012). Role-playing and storytelling are two features of gamification that were underutilized in this case, but it is exciting to imagine the benefits of a longer project where students create their own setting, characters, and abilities, and utilize their language all throughout the project. It is even possible to imagine combining digital tools to further immerse students in the project. Creating a visual representation of their setting, character, etc., are examples of how one could expand upon this activity. On the other hand, the activity utilized in this study was a non-digital activity, meaning the gamified elements were achieved without digital tools. Consequently, the findings indicate, like Far & Taghizadeh’s study (2022), that non-digital gamification has similar benefits to its digital counterpart. Therefore, the implication is that successful gamification can be achieved without digital tools, which require digital literacy and infrastructure, effectively making gamification more accessible.

The implications derived from this study reveal that non-digital gamification can be a tool in promoting engagement and motivation in students. Furthermore, the implications are that implementing game-based elements in creative, authentic, and communicative tasks will likely lead to engaged students. Moreover, if there is room for student autonomy in choice of setting and context, the potential for engagement is even more substantial. However, the findings also revealed the importance of the instructional phase of a lesson, and the importance of monitoring students' engagement as a potential sign that the activity is too difficult, or that part of the instruction was misunderstood. In other words, classroom management by the teacher is vital, no matter what the activity is. Moreover, the results hint at a trend of activities that EFL students are met with, and the response is quite clear that variety and creativity is more engaging and motivating than monotony and repetition, giving more credence to the utilization of gamification

in education. In any case, non-digital gamification presents a creative challenge for teachers, with potential boons to motivation and engagement in students.

Conclusion

This thesis attempted to answer the research question (RQ); To what extent does non-digital gamification enhance student engagement and motivation in an EFL context? To answer this question, the study employed a qualitative research design, with a single case study, utilizing a questionnaire and a group interview as data collection tools. Both questionnaire and interview were necessary to answer the RQ, as employing only one data collection tool was considered insufficient. The case study was designed around a single English lesson with eighteen 7th grade students. To explore the potential benefits of non-digital gamification, the study employed a gamified activity for the students to participate in. The activity's design allowed for autonomy, collaboration, communication, storytelling, and creative expression. Moreover, the activity was constructed as a communicative and authentic language task, meaning the students would utilize functional language to overcome the challenges in the activity. Lastly, the activity design was based on the motivation theories, and the game-design principles outlined in the literature chapter in order to promote engagement and motivation. In addition, the constructivist idea of learning by discovery, or trial and error, was considered as a baseline learning theory for the activity.

In the investigation, the findings revealed that sixteen out of eighteen participants felt engaged during the activity, based on the novelty of the assignment, its communicative and collaborative nature, the autonomy, and the creative context. The fact that the activity allowed for oral participation in a collaborative context was a great benefit to engagement. Furthermore, it was reported that the participants were intrigued by the opportunity to play a game in English, at school. Lastly, the creative context of the activity was repeatedly described as an important reason for engagement, which was in line with the practical design principles for intrinsic motivation that state the importance of context, curiosity, challenge, and control in designing activities that promote intrinsic motivation.

Investigating the student's motivation during the activity, revealed that all eighteen participants experienced motivation during the activity, although eight of the participants reported slight motivation during the activity. In any case, the results indicated that the activity was successful in promoting engagement and motivation. In addition to these findings, the questionnaire and interview revealed a relative trend of activities and tasks for the participants. This was revealed

in the responses that contrasted the gamified activity with their “regular” activities. Regular activities would include worksheets or writing tasks with a word requirement. It was made clear that the students prefer assignments that allow for creativity and autonomy, which is in line with the theories on motivation, and the theories surrounding game-design principles for motivation. For instance, flow theory recognizes the value of interest and attention in achieving a flow state. Similarly, SDT describes the value of autonomy and freedom of choice, and Expectancy-Value theory emphasizes the effect perceived value of a task has on motivation. In other words, the findings on motivation fit the theories describing the principles for promoting motivation. Although not a target finding for this study, it does imply that students appreciate more interactive and creative activities, or gamified activities.

However, while the results are indicative of the benefits of gamification, the nature of a single case study makes it difficult to produce an easily generalized conclusion that can be applied to every classroom, and similar cases. In other words, this study led to interesting implications, but needs further research to conclude confidently that gamification is a consistent and effective tool to generate engagement and motivation in an educational context. Furthermore, this study could have been strengthened by more comprehensive questions in the interview and the questionnaire. Despite the limitations of the study, the findings contribute to the scholarly pursuit to successfully implement gamification in an EFL context. Specifically, it adds to the library of empirical studies that investigate the benefits of gamification and continues to reveal that there is substantial potential to motivation, education, retention, and competence. Although a bold statement, the findings in this study, albeit limited in scope and scale, reveal similar empirical evidence as the studies mentioned in Far & Hazim’s systematic review of gamification studies (2023). Game based elements in a non-game-based context are conducive to motivating students.

The findings in this study illustrate how non-digital gamification is a viable option to digital gamification, which is helpful in making the implementation of gamification more accessible to teachers. Making gamification more accessible by demonstrating the value of non-digital gamification may contribute to more utilization of gamification in education and EFL contexts. Gamification does not have to be complicated in its application, as demonstrated in this study. Furthermore, the absence of digital tools may make it easier to improvise and adapt activities to be more gamified, which may in turn lead to more engaged students.

The main recommendations that stem from the results of this study, and the experiences made along the way, relate to the potential for creativity and English language learning. Specifically, research on writing activities for the purpose of gamification and play. Employing a similar activity, with a similar ruleset as employed in this study, as the backdrop for a variety of exciting and creative settings, with unique challenges and interesting expressions of individuality, imagination, and language. Research intended to investigate the benefits of gamification on writing motivation, or creative writing, could employ a gamified project like this, and explore the potential creativity, joy, engagement, motivation, and competence that might arise from such a project.

Considering the scale of this study, it would be interesting to see future research on a larger scale, both in terms of time and number of participants. A large-scale gamification project in an EFL context, where gamification is utilized as a tool for English language learning throughout a month of school. A project like this could investigate the effects on motivation and engagement in lessons over time. Moreover, the results on the development of language skills, and proficiency would also be important to investigate. Research on gamification often revolves around motivation, but with this example study, it could focus on both motivation and proficiency.

References:

- Andersen, R. & Rustad, M. (2022). Using Minecraft as an educational tool for supporting collaboration as a 21st century skill. *Computers and Education Open*, 3. <https://doi.org/10.1016/j.caeo.2022.100094>.
- Bakan, U., & Bakan, U. (2018). *Game-based learning studies in education journals: A systematic review of recent trends*. *Actualidades Pedagógicas*, (72), 119-145. doi: <https://doi.org/10.19052/ap.5245>
- Bandura, A. (1986). *Social foundations of thought and action: A social cognitive theory*. Prentice-Hall.
- Bandura, A. (1997). *Self-efficacy: The exercise of control*. W.H. Freeman and Company.
- Borg, W. R. and Gall, M. D. 1989. *Educational research: An introduction*. London: Longman.
- Computer Assisted Language Learning. (2020.) *Aims and scope*. Computer Assisted Language Learning. <https://www.tandfonline.com/action/journalInformation?show=aimsScope&journalCode=ncal20>
- Council of Europe. (No date). *Global scale - Table 1 (CERF 3.3): Common Reference levels*. COE. <https://www.coe.int/en/web/common-european-framework-reference-languages/table-1-cefr-3.3-common-reference-levels-global-scale>
- Csikszentmihalyi, M. (1990). *Flow: The psychology of optimal experience*. Harper & Row.
- Deterding, S., Dixon, D., Khaled, R., & Nacke, L. (2011, September). From Game Design Elements to Gamefulness: Defining Gamification. Conference: Proceedings of the 15th International Academic MindTrek Conference: Envisioning Future Media Environments. DOI:10.1145/2181037.2181040
- DFC Intelligence. (2023). *Global Video Game Consumer Segmentation*. DFC Intelligence. <https://www.dfcint.com/product/global-video-game-consumer/>
- Drive Thru RPG. *Tearable RPG*. (n.d.) <https://www.drivethrurpg.com/product/202680/Tearable-RPG>

- Dörnyei, Z. (2001). *Teaching and researching motivation*. Pearson Education.
- Dörnyei, Z. (2009). The antecedents of task behaviour: A dynamic systems account of task motivation. Paper presented at the Third Biennial Conference on Task-Based Language Teaching. Lancaster University, Lancaster, United Kingdom.
- Dörnyei, Z. (2007). *Research methods in applied linguistics: Quantitative, qualitative, and mixed methodologies*. Oxford University Press.
- Eccles, J. S., & Wigfield, A. (2002). Motivational beliefs, values, and goals. *Annual Review of Psychology*, 53(1), 109–132. <https://doi.org/10.1146/annurev.psych.53.100901.135153>
- Fariba Foroutan Far & Mahboubeh Taghizadeh (2022) Comparing the effects of digital and non-digital gamification on EFL learners' collocation knowledge, perceptions, and sense of flow, *Computer Assisted Language Learning*, DOI: [10.1080/09588221.2022.2146724](https://doi.org/10.1080/09588221.2022.2146724)
- Frey, J. H., & Fontana, A. (1991). The group interview in social research. *The Social Science Journal*, 28(2), 175-187. [https://doi.org/10.1016/0362-3319\(91\)90003-M](https://doi.org/10.1016/0362-3319(91)90003-M)
- Frontiers in Psychology. (2023). *Mission*. Frontiers in Psychology. <https://www.frontiersin.org/about/mission>
- Hu, X & McGeown, S. (2020). Exploring the relationship between foreign language motivation and achievement among primary school students learning English in China. *System*, 89, 102199. <https://doi.org/10.1016/j.system.2020.102199>
- Imsen, G. (2017). *Elevens Verden* (5th ed). Universitetsforlaget.
- Kapp, K.M. (2012). *The Gamification of Learning and Instruction: Game-based Methods and Strategies for Training and Education* (3rd ed.). PFEIFFER.
- Larochelle, M., & Bednarz, N. (1998). Constructivism and education: Beyond epistemological correctness. In M. Larochelle, N. Bednarz, & J. Garrison (Eds.), *Constructivism and Education* (pp. 3-20). Cambridge: Cambridge University Press. doi:10.1017/CBO9780511752865.002
- Mackey, A., & Gass, S. M. (2015). *Research methods in second language acquisition: A practical guide*. John Wiley & Sons.
- Minor, J. (2022, Oct. 27). *The Best Video Game for Kids*. Pcmag. <https://www.pcmag.com/picks/the-best-video-games-for-kids>

Norsk senter for forskningsdata. (n.d.) *Barnehage-og skoleforskning*. NSD.

<https://sikt.no/barnehage-og-skoleforskning>

Nunan, R. (2004). *Research Methods in Language Learning*. (13th ed.). Cambridge University Press.

Postholm, M. B. (2017). *Kvalitativ metode* (2nd ed.). Universitetsforlaget.

Pintrich & Schunk. (2002). *Motivation in Education: Theory, Research, and Applications*. (2nd ed.) Merrill.

Schell, J. (2019). *The Art of Game Design: A Book of Lenses* (3rd edition). <https://doi-org.ezproxy.uis.no/10.1201/b22101>

Silva, R. J. R. da, Rodrigues, R. G., & Leal, C. T. P. (2021). Gamification in management education: A systematic literature review. *Journal of Business Research*, 124, 425-438. <https://doi.org/10.1590/1807-7692bar2019180103>

Skehan, P. (2003). Task-based instruction. *Lang. Teach.* 36, 1–14. doi: 10.1017/S026144480200188X

Taguchi, N., & Kim, Y. (2016). Collaborative Dialogue in Learning Pragmatics: Pragmatic-Related Episodes as an Opportunity for Learning Request-Making. *Applied Linguistics*, 37(3), 416-437. <https://doi.org/10.1093/applin/amu039>

Utdanningsdirektoratet. (2019). Curriculum in English. Established as a Regulation by the Ministry of Education and Research, 15 November 2019. Curriculum for LK2020. <https://data.udir.no/kl06/v201906/laereplaner-lk20/ENG01-04.pdf?lang=eng>

Vygotsky, L. S. (1978). *Mind in society: The development of higher psychological processes*. Harvard University Press.

Wood, D., Bruner, J. S., & Ross, G. (1976). The role of tutoring in problem solving. *Journal of Child Psychology and Psychiatry*, 17(2), 89-100. <https://doi.org/10.1111/j.1469-7610.1976.tb00381.x>

Willis, D. & Willis, J. (2007). *Doing Task-based Teaching*. Oxford University Press.

Zhang S and Hasim Z (2023) Gamification in EFL/ESL instruction: A systematic review of empirical research. *Front. Psychol.* 13:1030790. doi: 10.3389/fpsyg.2022.1030790

Appendix 1

Questions

Question 1.

What do you think of English as a subject?

Hva synes dere om Engelskfaget?

Question 2.

How are English lessons usually carried out?

Hvordan pleier timer i Engelsk å være?

Question 3.

Do you enjoy those types of lessons?

Liker dere slike timer?

Question 4.

How did you enjoy this lesson?

Hva synes dere om timen dere nettopp hadde?

Question 5.

Did this type of lesson motivate you to engage?

Følte dere at dere ble motiverte av opplegget?

Appendix 2

Questionnaire

Questions:

Hva synes du om denne timen?

Likte du aktiviteten?

Hva likte du/likte du ikke med aktiviteten?

Opplevde du å være engasjert og motivert til å prestere?

Har du gjort noe lignende på skolen før?

Vil du delta i forskningsprosjektet

Dette er et spørsmål til deg om å delta i et forskningsprosjekt hvor formålet er å undersøke muligheten og potensialet for bruk av spill i undervisning. I dette skrivet gir vi deg informasjon om målene for prosjektet og hva deltakelse vil innebære for deg.

Formål

Formålet med dette forskningsprosjektet er å undersøke bruk av spilldesign prinsipper i skoleundervisning, med hovedfokus på Engelsk faget. Selve datainnsamlingen vil foregå i løpet av en skoletime hvor elever skal få gjennomføre et undervisningsopplegg og deretter svare på noen spørsmål om hvordan de opplevde timen og aktivitetene.

Dette forskningsprosjektet er hovedfokus i Master som jeg skriver. Masteroppgaven jeg skriver undersøker muligheten og potensialet for bruk av “spillifisering” eller “gamification” i skolen. I praksis vil “gamification” bety bruk av spill elementer som kreativ problemløsning, avatarer, levels, osv.

Hvem er ansvarlig for forskningsprosjektet?

Universitetet i Stavanger er ansvarlig for prosjektet.

Hvorfor får du spørsmål om å delta?

Mitt studie er 5-10 grunnskolelærer utdanning, og derfor er 7. klasse en passende aldersgruppe for min oppgave. Etter gjennomført undervisningstime vil elever få utdelt et spørreskjema som alle skal få mulighet til å svare på. I tillegg vil fire elever, valgt i samarbeid med kontaktlærer, intervjues etter undervisningstimen. Jeg spør om du vil delta slik at jeg kan få hente inn data om undervisningen jeg tester ut i forbindelse med min masteroppgave.

Hva innebærer det for deg å delta?

Dersom du deltar vil du få utdelt et spørreskjema på fem spørsmål. I dette spørreskjemaet er det ingen personopplysninger som skal hentes inn. Det vil bli satt av opp mot 10 minutter til å svare på spørreskjemaet. Spørsmålene i spørreskjemaet omhandler en undervisningstime og noen aktiviteter som du vil ha vært gjennom.

Jeg vil også be (fortsett ikke bestemt hvilke elever som skal bes om å delta) svare på noen spørsmål i et intervju. I dette intervjuet vil jeg ta i bruk lydopptak som vil si stemmen din vil bli tatt opp samt svarene på spørsmålene. Spørsmålene i intervjuet er mer detaljert enn spørreskjemaet med mål for refleksjon og tanker rundt undervisningen klassen gjennomførte.

Foreldre kan få se både spørreskjema og intervjuguide på forhånd om ønskelig ved å ta kontakt med meg.

Det er frivillig å delta

Det er frivillig å delta i prosjektet. Hvis du velger å delta, kan du når som helst trekke samtykket tilbake uten å oppgi noen grunn. Alle dine personopplysninger vil da bli slettet. Det vil ikke ha noen negative konsekvenser for deg hvis du ikke vil delta eller senere velger å trekke deg.

Alle elever vil gjennomføre undervisningsopplegget, men dersom elever ikke ønsker å svare på spørreskjemaet eller intervjuet, vil det bli organisert alternativ aktiviteter når andre elever svarer på spørreskjema.

Ditt personvern – hvordan vi oppbevarer og bruker dine opplysninger

Vi vil bare bruke opplysningene om deg til formålene vi har fortalt om i dette skrivet. Vi behandler opplysningene konfidensielt og i samsvar med personvernregelverket.

- Det er kun jeg (Gaute Skretting) og min veileder Marte Handal som vil ha tilgang til lydopptakene av intervjuet og spørreskjemaene.
- Ingen elever vil bli bedt om å oppgi navn, verken på spørreskjema eller i intervju. Dersom noen navn blir nevnt under intervjuet, vil disse bli fjernet og slettet fortløpende. Selve lydfil vil bli kryptert.

Hva skjer med personopplysningene dine når forskningsprosjektet avsluttes?

Prosjektet vil etter planen avsluttes 01.12.2023. Etter prosjektet avsluttes vil alle lydfiler og spørreskjema slettes.

Hva gir oss rett til å behandle personopplysninger om deg?

Vi behandler opplysninger om deg basert på ditt samtykke.

På oppdrag fra Norsk Senter for forskningsdata har Personverntjenester vurdert at behandlingen av personopplysninger i dette prosjektet er i samsvar med personvernregelverket.

Dine rettigheter

Så lenge du kan identifiseres i datamaterialet, har du rett til:

- innsyn i hvilke opplysninger vi behandler om deg, og å få utlevert en kopi av opplysningene
- å få rettet opplysninger om deg som er feil eller misvisende
- å få slettet personopplysninger om deg
- å sende klage til Datatilsynet om behandlingen av dine personopplysninger

Hvis du har spørsmål til studien, eller ønsker å vite mer om eller benytte deg av dine rettigheter, ta kontakt med:

- Universitetet i Stavanger: Gaute Skretting - gauteskretting@live.no - 93687945
- Universitetet i Stavanger: Marte Handal - Marte.handal@uis.no - 51832566
- Vårt personvernombud: Norsk Senter for forskningsdata

Hvis du har spørsmål knyttet til Personverntjenester sin vurdering av prosjektet, kan du ta kontakt med:

- Personverntjenester på epost (personverntjenester@sikt.no) eller på telefon: 53 21 15 00.

Med vennlig hilsen

Gaute Skretting

(Forsker/veileder)

Samtykkeerklæring

Jeg har mottatt og forstått informasjon om prosjektet [*sett inn tittel*], og har fått anledning til å stille spørsmål. Jeg samtykker til:

- å delta i intervju og lydopptak
- å delta i og svare på spørreskjema

Jeg samtykker til at mine opplysninger behandles frem til prosjektet er avsluttet

(Signert av prosjektdeltaker, dato)

Appendix 4

You are standing in front of a **[mausoleum, ancient pyramid, tomb, cave]**. You are here to retrieve a long lost treasure said to grant three wishes to whoever holds it. When you enter, you see a path that takes you to the right or the left, which one do you choose?

Walking down your chosen path, you see **[describe the walls; old cobwebs, stone spikes, smooth rock, carved rock, torches, any animals or insects?]**

After a while, you arrive in front of a door **[describe the door? metal door, stone door, wooden door, sketchings or markings on the door?]**

TRAP ROOM #1

When you enter the new room, the door closes behind you (At this point all doors are locked). **[describe the new room; dusty, cobwebs, purple, pink, stone, metal or wood?]** Along the walls in this corridor-like room, there are torches. There are five torches on each wall. When you walk into the room, you feel the ground shift under you. Suddenly oil starts to pour into the room from the roof! what do you do?!

There is a lever on the roof that will stop the oil from spilling, and open the door on the other end of the room.

TRAP ROOM #2

After a [a word to describe what just happened; close, epic, scary, cool, intense] escape from the oily room, you now find yourselves in a new corridor-like room. This new room does not actually feel like or look like a new room... It looks the same as the room you just came from, with a closed door on the opposite end.

There is a thin wire/thread in the room and if the party fails to spot and walk over it, will trigger trap #2.

If the trap triggers, the torches on the wall will turn towards the players and throw fire like flamethrowers towards the party **[describe the flames; raging fire, super hot fire, intense flames, streaming flames]**

If the trap is not triggered, the party simply walks through the door into the next room.

Riddle room

Leaving the flaming death-trap, you now find yourselves in a [**describe the room; a cube-shaped room, a triangle-shaped room, an oval room, stone walls, metal walls, wooden walls, torches?loose stones on the floor?, animals or insects on the ground?, any skeletons?, anything else?**] at the opposite end of the room, is a [**metal, wooden, stone**] door with a large mouth in the middle. When you approach the mouth, the mouth opens and it speaks; [pick riddle #1,#2, #3, or make up your own].

#1 A criminal has to carry a sack of stones from one side of the prison to another. What can he put in the sack that will make it lighter?

Answer: A hole

#2 Find a word that the first 2 letters are a male, the first 3 letters are a female, the first 4 letters are a great male, and the whole word is a great female.

Answer: Heroine

#3 Which five letter word has six left after you take two letters away?

Answer: Sixty

When the party solves the riddle, the mouth splits in the middle, and the door opens up into the next room.

Balance scale room

Describe the next room; [If you want your players to be nervous, describe the room exactly like the trap rooms! IF not; **a cube-shaped room, a triangle-shaped room, an**

oval room, stone walls, metal walls, wooden walls, torches?loose stones on the floor?, animals or insects on the ground?, any skeletons?, anything else?]

At the opposite end of the room, there is a door with a balance scale in front. On one of the scales sits a bag of 6 rocks. The other scale is empty. Around the room they can find only 4 rocks.

Here the players have to have even weight on both scales for the door to open. Once they solve the scale, they enter the treasure room.

Treasure room

The treasure room can be anything you like, you can describe it as a classroom, or as a cave, a throne room... the treasure can be anything you like as well!