SPEAKING ANXIETY AND PLAYING ONLINE GAMES AMONG ADOLESCENT EFL LEARNERS

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Abstract: While speaking is essential in learning English as a foreign language (EFL), speaking anxiety may create a barrier to being fluent and accurate among learners. In this sense, playing online games may provide opportunities for adolescent EFL students to improve their speaking skills and reduce their anxiety levels. However, the conclusions of a limited number of studies do not provide a consensus on the effects of online gaming on speaking anxiety among adolescents. This descriptive study aims to find the frequencies of playing online games in English and speaking anxiety among adolescents and explore whether the level of speaking anxiety among adolescent EFL learners differs in accordance with online games they play in the target language or not. Two background questionnaires and the Foreign Language Classroom Anxiety Scale (FLCAS) were administered to 175 high school students. The results showed that the majority of adolescent EFL learners engaged in playing online games in English and that they had a medium level of speaking anxiety. The study also concludes that speaking anxiety levels significantly decreased among adolescents who preferred online gaming in English. It was recommended that EFL teachers should encourage their students to play online games where the target language is used and raise their awareness of potential problems.

Keywords: English as a foreign language; speaking anxiety; computer games; adolescents

For several reasons, speaking skills play a considerable role in the EFL learning context. First, the learning environment is the only setting in which most EFL students use the target language orally. Therefore, speaking becomes more exacting for EFL learners who do not have the opportunity to practice English outside the class (Uztosun & Erten, 2006). In other words, as people who learn English as a foreign language do not reside in areas where it is spoken, it is critical to incorporate speaking skills into the EFL learning context. Second, EFL students have difficulty comprehending the correct pronunciation of words as they do not have constant exposure to the language. Consequently, any activity that supports their speaking skills also helps EFL learners to improve their pronunciation skills, as it is stated below:

"One of the general objectives in foreign language teaching, maybe the most important one, is to teach the learners to speak the target language accurately and intelligibly since to learn a language also means to produce the sounds, utterances, and words properly and correctly rather than being able to communicate with the people in the target language community. To reach this goal, speaking activities should be done at every stage of the foreign language teaching process" (Şenel, 2006, p. 111).

Third, learning a language requires both learning it grammatically and its culture along with its values as language is considered "inseparable" from culture (Jiang, 2000). EFL learners encounter a foreign culture that enforces them to proper their speaking skills that, indeed, becomes an important ability in the EFL context to survive in a new culture. Finally, English is now the lingua franca of many people worldwide, regardless of whether they are native or non-native English speakers (Bayyurt et al., 2019). Therefore, speaking skills are essential for EFL learners since they allow them to communicate with people from different nationalities, experience various cultures, and improve themselves by gaining new experiences. However, it should be pointed out that speaking skills constitute a problematic area in the EFL learning context due to affective factors including speaking anxiety.

Anxiety is one of the affective factors that may create a barrier to being fluent and accurate in the EFL learning context due to several reasons. First, it can be engendered by students' fear of making mistakes in the sight of their teachers and classmates. Learners may be stressed when they feel nervous about losing face in front of their classmates as a result of making mistakes (Agbalizu, 2006). In addition, it might be triggered by the fear of appearing to the teacher as a failing student, and "the idea of getting negative reactions from teachers may also create anxiety while speaking the target language" (Bayyurt et al., 2019, p.192). Second, students may be stressed by the prospect of being unable to use the language effectively. Learners may feel worried about using the new language when they believe that they do not have sufficient linguistic competence (Tóth, 2007). Certain detrimental effects of speaking anxiety on EFL learners' performance can be listed. To begin, since EFL learners do not have the opportunity to use English orally after classes, oral exposure to the target language is restricted to the classroom context. In this very limited span of classes, students who suffer from speaking anxiety are hesitant to talk and participate in conversational activities. Therefore, they hardly use English orally if the teacher does not encourage them to engage in activities, which is not a barrier that prevents them from practicing and developing their speaking skills. Second, anxious students avoid creating sophisticated and difficult messages and patterns in their speech as a result of anxiety impact on language learners' communication strategies (Horwitz et al., 1986). That is to say, speaking anxiety in the target language prevents them from uttering more than two or three words in a phrase. Finally, speaking anxiety makes EFL students apprehensive and biased toward English. Learners with speaking anxiety form a prejudice against English, and sometimes they do not even want to attend the classes.

While speaking anxiety stems from certain situations and negatively affects learners' performance, playing online games may provide opportunities for fostering speaking skills among EFL learners. First, pronunciation is a vital component of speaking ability that students need to improve in the EFL learning context. Learners who have poor pronunciation have difficulties conveying what they want to say, no matter how strong their grammatical knowledge or fluency is. It is stated that "with good pronunciation, a speaker is intelligible despite other errors; with poor pronunciation, a speaker can be very difficult to understand despite accuracy in other areas" (Fraser, 2000, p.7). Since students interact with native English speakers through online games, they hear native speakers' pronunciations and learn how to pronounce words correctly, which is an important step in improving EFL learners' oral communication skills. Second, having adequate vocabulary knowledge to speak a language is fundamental. That is to say, it is hard to form an utterance without having enough words. Students can learn new vocabulary while playing computer games since a large number of the games and their content are in English. As a result, these games help learners expand their vocabulary knowledge and foster their speaking skills. Third, EFL learners are exposed to English outside of the classroom context by playing online games and communicating with native speakers. Moreover, students who play computer games have a fun way to spend their leisure time while still learning English, which dispels their prejudices against the language. Therefore, EFL learners grow more inclined to speak in the target language and practice their speaking skills in the virtual and relatively more comfortable environment of online games.

Age is another factor that determines the prevalence of speaking anxiety among learners. The level of anxiety may be higher in adolescents. This is due to several reasons including that many types of chronic shyness appear to emerge during adolescence (Henderson et al., 2014). As a result of the changes they experience, they tend to become shy. Consequently, they may not want to speak English due to the shyness that emerges during adolescence. Second, the incidence of social anxiety increases during this period. The prominent symptoms of it are the fear of being humiliated and degraded. Correspondingly, adolescent learners who believe they will be laughed at and scolded by their teacher in front of their peers if they make a mistake may not be inclined to speak in the target language. From this perspective, online games may have an anxiety-reducing effect on this issue as students interact with native English speakers and hear the correct pronunciation, learn new vocabulary, and have fun while learning English through online games. Adolescents who spend most of their free time playing computer games may also deal with the devastating effect of speaking anxiety. Dramatically enough, the number of studies focusing on the effects of online games on speaking anxiety is not conclusive, as the research synthesis presented below also indicates. However, before contextualizing research, a theoretical framework should be drawn regarding speaking, speaking anxiety, and online games.

2. Theoretical framework

Speaking is "the process of building and sharing meaning through the use of verbal and non-verbal symbols in a variety of contexts" (Chaney & Burk, 1998, p. 13). According to Harmer (2001), speaking English requires the following elements for spoken production. First, fluent English requires the production of individual phonemes and the usage of fluent connected speech. Sounds are modified, omitted, and added in connected speech. Second, expressive devices are used to convey extra emotion and intensity. Using expressive devices means a change in intonation, pitch, speed, and incorporation of paralinguistic features into speech to convey how the speaker is feeling. Third, it is necessary to know some common lexical phrases to speak spontaneously. Therefore, speakers must be familiar with the lexical phrases that can be used in situations such as accepting, rejecting, and being surprised. Finally, negotiation language is used to provide clarification when a point in a speech is not understood. The use of negotiable language enhances effective speaking.

Anxiety is defined as an emotional disorder characterized by distress and bad feelings in the individual (Atalay et al., 2021). It can be divided into three categories as trait, state, and situation-specific anxiety. First, trait anxiety is defined as a part of personality. Second, state anxiety is considered a reaction to a specific situation at a particular time (Aydin et al., 2021). Third, situation-specific anxiety refers to concern about particular events and situations such as foreign language anxiety. Horwitz et al. (1986, p. 128) define foreign language anxiety as "a distinct complex construct of self-perceptions, beliefs, feelings, and behaviors related to classroom language learning arising from the uniqueness of the language learning process". Foreign language anxiety includes three components: fear of negative evaluation, test anxiety, and communication apprehension. First, fear of negative evaluation is the sensation of "apprehension about others' evaluations, avoidance of evaluative situations, and expectation that others would evaluate oneself negatively" (p. 127). Second, test anxiety is "a type of performance anxiety stemming from a fear of failure"(p. 128). Third, communication apprehension is a state in which individuals hesitate to communicate orally. In other words, it is "a type of shyness characterized by fear or anxiety about communicating with people" (p. 128). Speaking anxiety can be defined as the fear of speaking that follows people's reluctance and concerns about speaking. McCroskey et al. (1986) divide communication apprehension into four sub-categories: trait-like, context-based, audience-based, and situational. First, trait-like communication apprehension is related to speakers' personalities. Second, context-based communication apprehension is the concern that speakers develop towards communicating in a particular context. Third, audience-based communication apprehension could be defined as the fear of communicating with certain people or groups. Finally, situational communication apprehension refers to the psychological response of speakers due to a definite situation.

A game is a system in which players are involved in a simulated dispute that is specified by rules and has a measurable outcome (Salen, 2004). Hinske et al. (2007) indicate that a game has six elements: rules, competition, the goal, the outcome, decisions, and emotional attachment. Rules are standards that must be followed to play a game properly; competition is the conflict between players. The goal is what players want to achieve, the outcome is what players get at the end, decisions are the actions that are taken to achieve the goal, and emotional attachment is the value assigned to the outcome and the effort spent on it. Computer games are played via a computer or a similar technological device. Sukhov (2015) states that there are two main educational aspects of computer games; internal and external. The internal aspect relates to the usage of what players learned in the tutorial in the next games, while the external aspect represents the educational advantages of computer games for personal and professional development such as foreign language learning. In addition, learning mostly depends on people's social surroundings and social assistance from others, representing the Zone of Proximal Development according to the Vygotskian approach to learning (Vygotsky, 1978). Computer games create a social environment in which learners can collaborate on foreign language learning. Furthermore, game-based learning refers to the utilization of video games and elements connected to game reality, content, subject, and visuals (Ge & Ifenthaler, 2018). The educational game places the student at the center of the learning process, making it easier, more engaging, and more efficient (Cheng & Su, 2012).

3. Literature review

In general, research on the relationship between video games and oral communication skills indicates that video games positively affect learners' speaking skills. For instance, Azman and Farhana Dollsaid (2018) investigated the language learning elements in the design of a serious massively multiplayer online role-playing game. The data were collected using a questionnaire, in-game chat logs, and email interviews. The study concluded that online multilingual speakers could benefit from massively multiplayer online role-playing games since they could provide contextualized and real language contact chances in English. In another example, Altinbas and Savas (2020) investigated the impact of multiplayer online games on basic language skills. English preliminary tests were administered to 13 Turkish EFL students who participated in online multiplayer games before and after the games. The findings showed that the gaming session improved the overall development of basic language skills. Last, Toufik and Hanane (2021) investigated how online video games could be beneficial in developing communication and intercultural communication skills among EFL students and to what extent age and gender variables affect this connection. An online student questionnaire, interviews, and in-game observations were used to collect data. They concluded that online video games assisted EFL learners in improving their communication abilities and intercultural communication skills in educational contexts.

A synthesis of previous research demonstrates that video games reduce speaking anxiety and reinforce oral communication skills among EFL learners. For instance, Grimshaw and Cardoso (2018) conducted a study to reveal whether the Spaceteam ESL game affected verbal fluency, anxiety, and willingness to communicate. While the experimental group played a mobile game as a warm-up for six weeks, the control group did not play any games. Pre-tests and post-tests were used to measure changes in verbal fluency, while students' willingness to communicate and speaking anxiety levels were analyzed through interviews. Findings showed that the participants who played Spaceteam ESL performed better with oral fluency, and the game positively affected anxiety and willingness to communicate. Soyoof and Mclay (2019) studied whether video game intervention may help Iranian EFL students reduce stress and improve their English language competency and communication skills. Video games were included in the students' learning processes in the experimental group, whereas the learning processes of the students in the control group continued in the same way. They concluded that the stress level remained the same, and students in the experimental group improved their communication skills ability. Ishaq and Omar (2021) also carried out a study to find whether video games were helpful in reducing the speaking anxiety level of Algerian EFL learners. Twenty-six students participated in a five-week gaming session and took a pre-test and a post-test to see whether there was a

difference in their speaking anxiety levels. The findings showed that video games could be an effective way to reduce the speaking anxiety of EFL students. However, research shows that using Second Life has no effect on speaking anxiety among EFL learners. For instance, Güzel and Aydin (2019) investigated the effects of using Second Life on speaking anxiety. Forty-four students were given a background questionnaire and an anxiety scale before and after speaking practice in the traditional classroom setting and online environment, Second Life. No significant difference in speaking anxiety was observed regarding the uses of the mentioned environments.

3.1 Overview of the current study

In brief, speaking skills play a significant role and have an essential presence in the EFL learning context, while speaking anxiety is one of the affective factors that might make it difficult to be fluent and accurate in the EFL learning context. While speaking anxiety is caused by specific circumstances and is detrimental to learners' performance, playing online games may provide opportunities for adolescent EFL students to improve their speaking skills. On the other hand, few studies focus on the relationship between online games and speaking anxiety in an EFL context. In addition, research focused on more general subjects such as the effects of computer games on oral communication skills. However, studies on the issue have not provided a consensus on whether online games reduce EFL learners' speaking anxiety or not. With these concerns in mind, the current study aims to find the levels of playing online games in English and speaking anxiety among adolescents and explore whether the level of speaking anxiety among adolescent EFL learners differs in accordance with online games they play in the target language or not and seeks answers to the following research questions:

- What is the level of playing online games in the target language among adolescent EFL learners?
- What is the level of speaking anxiety among adolescent EFL learners?
- Does the level of speaking anxiety among adolescent EFL learners differ by online gaming in the target language?

4. Method
4.1 Research context

Under an analytic and deductive objective perspective, a descriptive research design was preferred in the current study since it was necessary to gain further insights into speaking anxiety, playing online games in the target language, and the relationship between the two due to two reasons. First, the descriptive research design seemed appropriate to fulfill the purposes of the study since it refers to examining data with preconceived research questions. Second, as the nature of speaking anxiety and playing online games are the main interest in the study, questionnaires and a scale were used to gather data from the participants' perspectives in a natural context (Seliger & Shohamy, 1989).

4.2 Participants

The sample group in the study consisted of 175 students enrolled at a state high school in Istanbul, Turkey. The participants were 100 female (57.1%) and 75 male (42.9%) students. The gender distribution of the participants was the reflection of the general population of the mentioned school. The mean score for their age was 14.97 within the range of 14 and 16. In other words, the participants were 14 (n=55, 31.4%), 15 (n=70, 40%), and 16 (n=50, 28.6%) years old. The sample group consisted of 34 ninth (19.4%), 84 tenth (48.0%), and 57 eleventh (32.6%) grade students. They were also grouped in accordance with beginner (A1), elementary (A2), intermediate (B1), and upper-intermediate (B2) levels by the standard of the Common European Framework of Reference for Languages (CEFR). The group consisted of A1 (n=53, 30.3%), A2 (n=75, 42.9%), B1 (n=21, 12.0%), and B2 (n=26, 14.9%) level students. Last, the mean score for their class hours a week was 6.45 in the range of four and 16. It should be noted that the weekly class hours differed in accordance with their departments such as language, science and mathematics, and social sciences. They had four (n=87, 49.7%), six (n=50, 28.6%), eight (n=16, 9.1%), and 16

(n=22, 12.6%) hours of English classes a week, as indicated in Table 1. As a final note, random sampling was preferred in the study since the sample group reflected the representation of the total population in the mentioned school in accordance with gender, age, grade, target language proficiency, and class hours.

Table 1. Participants' demographics (n=175)

Variables		Frequency	Percent
Age	14	55	31.4
	15	70	40.0
	16	50	28.6
Gender	Female	100	57.1
	Male	75	42.9
Grade	9	34	19.4
	10	84	48.0
	11	57	32.6
Language levels	A1	53	30.3
	A2	75	42.9
	B1	21	12.0
	B2	26	14.9
Weekly class hours	4	87	49.7
	6	50	28.6
	8	16	9.1
	16	22	12.6

4.3 Tools

Three data collection instruments were used in the current study. First, a background questionnaire was used to obtain data on the participants' age, gender, grade, levels of the target language proficiency, and weekly English class hours. A second questionnaire was used to investigate whether the participants played online games in English, the frequency of playing, the time spent playing a day, and the types of online games they preferred. Third, the FLCAS developed by Horwitz et al. (1986) was used to measure participants' speaking anxiety levels. The scale consisted of 33 items and included the constructs of communication apprehension, fear of negative evaluation, and test anxiety. The items were scored on a 5-point Likert scale (1=strongly disagree, 2=disagree, 3=neither agree nor disagree, 4=agree, and 5=strongly agree). The internal consistency based on Cronbach's Alpha coefficient was reported as .93 in the study by Horwitz et al. (1986). However, % of the variance was not reported in the mentioned study.

4.4 Procedure

After the Ethics Committee of Educational Sciences approval, an online version of the research instruments was prepared and shared via Google Forms. In the form, potential participants were informed about the purpose of the study. They were also informed that participation in the research was voluntary and that the researchers ensured the anonymity and confidentiality of their responses. Then, the participants were invited to participate in the study by contacting their teachers. The form was kept available online for 15 days.

The Statistical Package for Social Sciences (SPSS) software was preferred to analyze the data collected. For this purpose, numbers and frequencies for age, gender, grade, proficiency levels in the target language, and weekly English class hours were calculated. The mean scores for their age and weekly class hours were computed. Then, numbers and frequencies for playing online games in English, playing frequencies, time spent playing a day, and the types of online games were calculated. In the current study, 10 items were analyzed regarding speaking anxiety, while 33 items in the scale were administered to see the levels of the reliability and validity of the FLCAS. The reliability coefficient and % of variance were computed for the FLCAS and speaking anxiety. The reliability coefficient in

Cronbach's Alpha was .85 for the FLCAS and .73 for the construct of speaking anxiety. Regarding the validity of the data, the values for % of variance were 62.21 for the FLCAS and 61.19 for speaking anxiety. The values regarding the reliability coefficients and % of variance showed a high level of reliability and validity of the data, as shown in Table 2.

Table 2. The reliability coefficients and percentage of variances

Scales	N of Items	Cronbach's Alpha	% of Variance
Foreign language anxiety	33	.85	62.21
Speaking anxiety	11	.73	61.19

The descriptive data including frequencies and percentages for the preference of online games in English, the frequency of playing, time spent per day, and the types of online games they preferred were prepared. Then, means and standard deviations were computed for the items of speaking anxiety. The independent samples t-test was used to see differences between speaking anxiety and the preference for online games in English. Finally, the Kruskal Wallis H Test was used to explore the differences between speaking anxiety and the frequency of playing, time spent per day, and the types of online games they preferred. The reason why independent samples t-test and Kruskal Wallis-H Test were used was to explore the differences between the items regarding speaking skills and the variables related to playing online games in English since interval scale level and total scores that are unable to achieve measurement would be inappropriate for examining differences (Embretson, 1996). As a final note, Kruskal Wallis-H Test was considered the non-parametric alternative to ANOVA since non-parametric tests seemed appropriate for a sample size smaller than 30 (Chavez et al., 2020).

5. Results
5.1 Online gaming habits
The values presented in Table 3 show that the participants mostly engage in playing online games in English. First, 123 participants (70.3%) stated that they played online games, while 52 students (29.7%) did not prefer playing. Second, of 123 participants who preferred playing online games, 38 students (30.9%) reported that they played almost every day, while 34 participants (27.6%) played online games once or twice a semester. In addition, 30 participants (24.4%) stated that they liked playing once or twice a week, whereas only 21 (17.1%) rarely played, namely once or twice a month. Third, 30 participants (24.4%) spent less than one hour a day, whereas only five (4.1%) preferred wasting time more than five hours a day. Additionally, 34 students (27.6%) used around one hour a day, while only 11 participants (8.9%) stated that they spent around four hours a day. The remaining participants stated that they played online games in English for around two hours (n=25, 20.3%) and around three hours (n=18, 14.6%). Fourth and last, the most popular game type among the participants was shooters (n=44, 35.8%), while the least preferred one was action and adventure (n=12, 9.8%). The other game types were simulation and sports (n=24, 19.5%), puzzlers and party games (24, 19.5%), and real-time strategy (n=19, 15.4%).

Table 3. Descriptives for online gaming preferences and habits

Variables	Responses	Frequency	Percent
Playing online games	Yes	123	70.3
	No	52	29.7
	Total	175	100.0
Frequency	Once or twice a semester	34	27.6
	Once or twice a month	21	17.1
	Once or twice a week	30	24.4
	Almost every day	38	30.9
	Total	123	100.0
Playing for hour a day	Less than one hour	30	24.4

	Around one hour	34	27.6
	Around two hours	25	20.3
	Around three hours	18	14.6
	Around four hours	11	8.9
	More than five hours	5	4.1
	Total	123	100.0
Types of the games played	Simulation and sports	24	19.5
	Action and adventure	12	9.8
	Shooters	44	35.8
	Puzzlers and party games	24	19.5
	Real-time strategy	19	15.4
	Total	123	100.0

5.2 Speaking anxiety

As indicated in Table 4, the participants have a moderate level of speaking anxiety ($\bar{x}$=2.88). For instance, they agreed that they had medium levels of speaking anxiety regarding feeling panic while speaking without preparation ($\bar{x}$=3.35), feeling overwhelmed by the number of rules they had to learn for speaking English ($\bar{x}$=3.04), feeling that other students were better at speaking English ($\bar{x}$=2.90), feeling not sure while speaking ($\bar{x}$=3.03), and being afraid that other students would laugh when they spoke ($\bar{x}$=2.81). The participants also believed that they felt confident ($\bar{x}$=3.07) and self-conscious ($\bar{x}$=2.61) when they spoke in their English classes, felt comfortable ($\bar{x}$=3.01) and not nervous ($\bar{x}$=2.87) while speaking to native speakers of English. Last, the participants disagreed that they got nervous and confused while speaking in their English classes ($\bar{x}$=2.17).

Table 4. Descriptives for speaking anxiety (n=175)

Items		(1) Strongly disagree	(2) Disagree	(3) Undecided	(4) Agree	(5) Strongly agree	Mean	Std. Deviation
I start to panic when I have to speak without preparation in language class.	N	28	19	38	43	47	3.35	1.40
	%	16.0	10.9	21.7	24.6	26.9		
I feel confident when I speak in foreign language class.	N	28	23	61	34	29	3.07	1.28
	%	16.0	13.1	34.9	19.4	16.6		
I feel overwhelmed by the number of rules you have to learn to speak a foreign language.	N	35	29	42	32	37	3.04	1.42
	%	20.0	16.6	24.0	18.3	21.1		
I never feel quite sure of myself when I am speaking in my foreign language class.	N	27	27	58	39	24	3.03	1.25
	%	15.4	15.4	33.1	22.3	13.7		
I would probably feel comfortable around native speakers of the foreign language.	N	34	38	44	30	29	3.01	1.30
	%	19.4	21.7	25.1	17.1	16.6		
I always feel that the other students speak the foreign language class better than I do.	N	31	27	53	38	26	2.90	1.35
	%	17.7	15.4	30.3	21.7	14.9		
I wouldn't be nervous speaking the foreign language with native speakers.	N	35	35	53	22	30	2.87	1.34
	%	20.0	20.0	30.3	12.6	17.1		
I am afraid that the other students will laugh at me when I speak the foreign language.	N	58	20	32	28	37	2.81	1.56
	%	33.1	11.4	18.3	16.0	21.1		
I feel very self-conscious about speaking the foreign language in front of other students.	N	44	48	38	23	22	2.61	1.33
	%	25.1	27.4	21.7	13.1	12.6		
	N	62	57	34	9	13	2.17	1.18

I get nervous and confused when I am speaking in my language class.	%	35.4	32.6	19.4	5.1	7.4		
					Total score	2.88	.63	

5.3 Relationship between online gaming and speaking anxiety

Values given in Table 5 demonstrate that the levels of anxiety among the participants significantly differ when their online game-playing preferences are considered (p=.00). For instance, participants who played games stated that they felt surer of themselves while speaking in their English classes (p=.00), experienced less panic while speaking without preparation (p=.00), and were less nervous while speaking to native speakers (p=.00), when compared to the ones who never played online games in English. Moreover, participants who preferred playing online games felt more confident while speaking in foreign language classes (p=.00), were less self-conscious about speaking in front of their classmates (p=.00), and felt more comfortable around native speakers of English (p=.00) than the students who did not play online games in English. They also felt less afraid that other students would laugh at them while speaking English (p=.00), less overwhelmed by the number of rules they needed to learn to speak English (p=.00), and less nervous and confused while speaking in their language classes (p=.00) than the ones who did not play online games. Last, the participants who played online games in English felt less comfortable when the other students were better at speaking (p=.00) compared to the participants who did not prefer playing.

Table 5. Online gaming and speaking anxiety (Independent samples t-test)

Items	Preferences	N	Mean	Std. Deviation	F	Sig.
I never feel quite sure of myself when I am speaking in my foreign language class.	Yes	123	2.77	1.19	4.58	.00
	No	52	3.65	1.15		
I start to panic when I have to speak without preparation in language class.	Yes	123	3.11	1.42	3.92	.00
	No	52	3.92	1.17		
I wouldn't be nervous speaking the foreign language with native speakers.	Yes	123	3.12	1.26	3.88	.00
	No	52	2.27	1.36		
I feel confident when I speak in foreign language class.	Yes	123	3.37	1.20	4.93	.00
	No	52	2.38	1.21		
I always feel that the other students speak the foreign language class better than I do.	Yes	123	2.63	1.31	4.40	.00
	No	52	3.54	1.23		
I feel very self-conscious about speaking the foreign language in front of other students.	Yes	123	2.36	1.21	3.69	.00
	No	52	3.19	1.43		
I get nervous and confused when I am speaking in my language class.	Yes	123	1.90	1.04	4.30	.00
	No	52	2.79	1.27		
I feel overwhelmed by the number of rules you have to learn to speak a foreign language.	Yes	123	2.79	1.40	3.88	.00
	No	52	3.63	1.28		
I am afraid that the other students will laugh at me when I speak the foreign language.	Yes	123	2.57	1.56	3.30	.00
	No	52	3.37	1.41		
I would probably feel comfortable around native speakers of the foreign language.	Yes	123	3.23	1.23	3.51	.00
	No	52	2.48	1.31		
Total score	Yes	123	2.75	.636	3.39	.00
	No	52	3.11	.634		

The findings presented below show that the levels of speaking anxiety in terms of certain items significantly differ regarding online game frequency, time spent playing, and the types of games preferred, while no significant difference is found between the total score for speaking anxiety and mentioned variables. First, the level of speaking anxiety stemmed from feeling panic about speaking without preparation in their English classes significantly differed in accordance with playing frequency (p=.00). The participants who played online games almost every day stated that they had the lowest level of speaking anxiety during speaking English without preparation in their classes, while the ones who played once or twice a semester experienced higher levels of speaking anxiety, as Table 6 illustrates.

Table 6. Playing frequency and speaking anxiety (Kruskal-Wallis Test) (n=123)

Items	Frequency	N	Mean Rank	Chi-Square	Asymp. Sig.
I start to panic when I have to speak without preparation in language class.	Once or twice a semester	34	70.90	13.30	.00
	Once or twice a month	21	75.40		
	Once or twice a week	30	62.75		
	Almost every day	38	46.04		

Second, the level of feeling comfortable around native English speakers significantly differed in terms of time spent for playing a day (p=.01). In other words, the participants who played around two hours a day were the ones who felt more comfortable around native speakers compared to the ones who played less than one hour, around one hour, and more than three hours, as shown in Table 7.

Table 7. Time spent playing online games and speaking anxiety (Kruskal-Wallis Test) (n=123)

Items	Frequency	N	Mean Rank	Chi-Square	Asymp. Sig.
I would probably feel comfortable around native speakers of the foreign language.	Less than one hour	30	62.65	11.57	.04
	Around one hour	34	52.78		
	Around two hours	25	78.98		
	Around three hours	18	49.06		
	Around four hours	11	68.32		
	More than five hours	5	68.60		

Third and last, the levels of speaking anxiety regarding two items in the scale considerably differed in terms of the types of online games. The participants who preferred action and adventure games felt less nervous and confused when they spoke in their English classes than the ones who liked to play simulation and sports, shooters, puzzlers and party games, and real-time strategy (p=.01). The students in the same group were also less afraid that other students would laugh when they spoke English than the ones who preferred other game types listed in Table 8.

Table 8. Types of the games played and speaking anxiety (Kruskal-Wallis Test) (n=123)

Items	Frequency	N	Mean Rank	Chi-Square	Asymp. Sig.
I get nervous and confused when I am speaking in my language class.	Simulation and sports	24	51.71	17.49	.01
	Action and adventure	12	31.92		
	Shooters	44	69.03		
	Puzzlers and party games	24	74.69		
	Real-time strategy	19	61.68		
I am afraid that the other students will laugh at me when I speak the foreign language.	Simulation and sports	24	59.90	9.80	.04
	Action and adventure	12	36.75		
	Shooters	44	62.06		
	Puzzlers and party games	24	74.04		
	Real-time strategy	19	65.26		

6. Conclusions and discussion

The findings of this research which aims to find the levels of playing online games in English and speaking anxiety among adolescents and explore whether the level of speaking anxiety among adolescent EFL learners differs in accordance with online games they play in the target language, three main conclusions were reached. The first conclusion is that the majority of adolescent EFL learners engage in playing online games in English. In this perspective, more than half of adolescents prefer playing once or twice a week and every day. In addition, over half of them spend time playing online games around one hour a day. Adolescent EFL learners mostly prefer shooters, simulations, sports, puzzlers, and party games. The second conclusion is that high school EFL learners have a medium

level of speaking anxiety. Speaking more specifically, they feel panicked, overwhelmed, afraid, nervous, and confused in their speaking classes at a moderate level. Similarly, they feel confident and self-conscious when they speak English at a medium level. The third conclusion reached in the study is that speaking anxiety levels significantly decrease among adolescents who prefer online gaming in English. For instance, adolescents who like playing online games in English reportedly feel surer, more self-conscious and comfortable, less afraid and panicky, less nervous and afraid, and less confused when they speak English compared to their peers who do not play online games. It is also observed that the more the frequency of playing increases, the less students feel panicked during unprepared speaking situations. Moreover, adolescents who spend moderate time playing feel more comfortable with native speakers of English. High school students who prefer action and adventure games feel less nervous and less fearful of negative evaluation when they speak English, compared to those who prefer other game types such as simulation and sports, shooters, puzzlers and party games, and real-time strategy.

The above-mentioned conclusions may relate to several factors. First, the rationale behind most adolescents' preference for playing online games may relate to their psychological and social needs, namely competence, autonomy, and relatedness, within the scope of the Self-Determination Theory (Deci & Ryan, 2012). In this perspective, adolescents may engage in playing online games to feel masterful, autonomous, and connected (Ryan et al., 2006). Second, while speaking anxiety constitutes a considerable problem in the EFL learning context, why adolescents have a medium level of speaking anxiety may be that they have a chance to access real communication opportunities, authentic materials, and realistic situations to use the target language provided via the Internet (Namaziandost et al., 2022). Third and in a broader perspective, why speaking anxiety levels significantly decrease among adolescents who prefer online gaming in English may depend on the positive effects of engagement, one of the components of overall well-being. In addition to engagement, a position of loss of self during the performance of an activity considered pleasurable, adolescents may create relationships with their peers around and native or multilingual speakers of English all over the world and accomplishment that involves feelings of mastery and achievement (Butler & Kern, 2016; Seligman, 2002) while playing online games. From a narrower perspective, since the authentic use of the target language may develop learners' basic language skills and knowledge areas, the perceived proficiency in speaking may be a factor that decreases the level of speaking anxiety (Aydin, 2018).

A summary of the results obtained from the current study is provided below. In the broadest perspective, the results of the study show consistency with the previous research results showing that video games positively affect learners' speaking skills (Altinbas & Savas, 2020; Azman & Farhana Dollsaid, 2018; Toufik & Hanane, 2021), since it concludes that online gaming in English is a variable that significantly decreases the levels of speaking anxiety among adolescent EFL learners. The findings of the study are also similar to the ones showing that the use of video games reduces speaking anxiety in the EFL learning context (Grimshaw & Cardoso, 2018; Ishaq & Omar, 2021). On the other hand, while previous research indicates that the level of stress (Soyoof & Mclay, 2019) and speaking anxiety (Güzel & Aydin, 2019) among learners does not change after game interventions, the current study concludes that the level of speaking anxiety among adolescents who prefer playing online games in English significantly decreases. To conclude, the conclusions reached in the current study may contribute to the related literature due to the scarce number of studies that show inconsistencies in the effects of online gaming on speaking anxiety and the lack of research on the issue specifically focusing on adolescent EFL learners.

In light of the findings reached in the study, some practical recommendations can be noted. First, EFL teachers should encourage their students to play online games where the target language is used. In this way, it will be possible to develop learners' overall language proficiency and speaking skills and, specifically, to reduce their anxiety levels. On the other hand, teachers should also be aware of potential problems regarding online gaming among students. In this scope, teachers should know that accessibility, security, and privacy should be protected and that interactions in game-based environments may have adverse effects on adolescents' social and psychological development including

the development of communication and socialization skills, social awareness, and relationship-building (Poth, 2022). Moreover, teachers need to pay special attention to cyberbullying, abuse, physical health problems, game addictions, and addiction disorders that may trigger anxiety and depression among adolescents (Aydin, 2022). To achieve the potential benefits of online gaming for foreign language teaching and learning and eliminate the adverse effects and problems mentioned above, EFL teachers should assign controlled time for playing in and outside the classroom under in-class and parental control for their students. In addition, there is a strong need for collaboration among teachers, students, parents, school psychologists, administrators, and ICT coordinators at schools. In this sense, the stakeholders can develop educational programs on online games to guide students and their parents on the effects of online gaming on EFL learning. On the other hand, the recommendations noted above cannot be realized unless the issues in relation to the effects of gaming on foreign language learning and affective states such as attitudes, motivation, and anxiety are integrated and implemented into the pre-service and in-service teacher education programs that aim to inform EFL teachers and raise their awareness regarding the theoretical and practical aspects of online gaming in the target language.

The study is not without limitations. First, the scope of the study was limited to a descriptive research design that used a background questionnaire and the FLCAS. Thus, the data analysis was confined to descriptive statistics, independent samples t-test, and Kruskal Wallis-H Test. Second, the participants were restricted to 175 high school students at beginner and intermediate levels of English. Third and last, the data included the perceived habits of online games and foreign language anxiety.

Further research on EFL learners' actual gaming habits and speaking anxiety including young learners and adults is warranted. It can also be recommended that longitudinal, qualitative, and experimental research should be performed to explore actual habits and speaking anxiety among EFL learners. Moreover, larger samples should be preferred in descriptive studies. Last, cultural, individual, social, and psychological aspects of playing online games and their effects on anxiety, other affective states, and the EFL learning process should be investigated.

7. Disclosure of conflict
The authors declare that they have no conflicts of interest.

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