

Harmonizing Algorithms and User Satisfaction: Evaluating The Impact of Spotify's Discover Weekly on Customer Loyalty

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Abstract

Integrating artificial intelligence (AI) in music streaming platforms has significantly transformed user experiences, with personalized features playing a key role. This study investigates the impact of Spotify's "Discover Weekly" feature on Indonesian users' satisfaction and customer loyalty. The research examines how the quality of service experience, perceived usefulness, and user engagement interplay to influence the effectiveness of "Discover Weekly" in enhancing user experience and fostering loyalty to Spotify. Using a mixed-methods approach, the study utilizes qualitative analysis through automated coding with Nvivo software (18 respondents) and quantitative analysis using Partial Least Squares Structural Equation Modeling (PLS-SEM) with 397 respondents. The target demographic is Generation Z, familiar with or using the "Discover Weekly" feature. Findings reveal a significant positive impact of service quality experienced through "Discover Weekly" on user satisfaction and subsequent loyalty to Spotify. Additionally, there is a strong positive relationship between user satisfaction and word-of-mouth promotion, suggesting that satisfied users are more likely to recommend "Discover Weekly" to others. Recommendations include enhancing playlist discoverability, refining music content, and encouraging positive word-of-mouth promotion. Future research should explore personalized playlists on other platforms, analyze different demographic profiles, and evaluate additional features offered by Spotify to provide a broader understanding of user experience and loyalty dynamics.

Keywords: Customer Loyalty, Customer Satisfaction, Discover Weekly, Positive Word-of-Mouth Quality of Service Experience

A. INTRODUCTION

The music industry has undergone a major transformation with the advent of digital technology. While music consumption once depended heavily on physical formats like vinyl records and cassettes, digital platforms have now democratized access to music, altering how people engage with their favorite tunes. A key technology driving this change is artificial intelligence (AI), which is designed to perform tasks that typically require human intelligence, such as learning from data-driven insights and making recommendations based on algorithms (What Is AI (Artificial Intelligence)?, 2023).

AI has revolutionized music streaming by creating personalized listening experiences and enhancing user interactions through sophisticated algorithms. Spotify is a leading example of a platform that integrates AI to transform the user experience (Lindblom, 2015). In Indonesia, a 2021 survey revealed that Spotify dominates the market with a substantial share of approximately 32%, surpassing competitors like Apple Music, YouTube Music, and Amazon Music, which hold market shares of 15%, 13.6%, and 12.6%, respectively (Socialexpat, 2023). Among Spotify's notable AI-driven features is the "Discover Weekly" playlist, crucial in maintaining customer engagement and loyalty in the digital era.

Previous research indicates that the quality of service experience, including AI-driven features, is crucial and directly impacts user loyalty to music streaming platforms over time (The Service Experience in Tourism, 2017). User loyalty is often a result of satisfaction, which arises from consumers continuously evaluating products or services based on their overall experiences (Anderson, 1973). Therefore, ensuring a high-quality service experience is vital for retaining existing users and attracting new ones, as it is the most effective way to boost customer satisfaction and foster loyalty. Harvard research supports this, noting that 90% of highly satisfied customers with a brand will likely return (Establishing Brand Loyalty Through Customer Experience, n.d.).

Preliminary findings reveal that 87.9% of individuals know the "Discover Weekly" feature and find it beneficial. However, competitors like Apple Music, YouTube Music, and Amazon Music each have their strengths. Spotify must leverage its technology effectively to remain competitive and sustain its leading market

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position (Scarrott et al., 2024). This research explores whether the "Discover Weekly" feature is sufficient to enhance customer experience, satisfy users, and ultimately build customer loyalty.

Artificial Intelligence

In 1942, Isaac Asimov's short story "Runaround" introduced the Three Laws of Robotics, which have influenced many in robotics, AI, and computer science. Simultaneously, Alan Turing developed "The Bombe," a code-breaking machine for the British government, which led to the creation of the Turing Test for evaluating machine intelligence. "Artificial Intelligence" was first coined in 1956 by Marvin Minsky and John McCarthy. Notable early AI milestones include Joseph Weizenbaum's ELIZA program, which simulated conversations, and the General Problem Solver program developed by Herbert Simon, Cliff Shaw, and Allen Newell. Despite early optimism, progress in AI was initially slow and costly, leading to some skepticism about its potential (Haenlein & Kaplan, 2019). AI is categorized into three types based on functionality: Artificial Narrow Intelligence (ANI), Artificial General Intelligence (AGI), and Artificial Super Intelligence (ASI) (Khan, 2021).

In the 1990s, the entertainment industry began to evolve with the introduction of AI technology, particularly in visual effects and computer-generated imagery (Luxton, 2013). AI-powered software and algorithms have significantly enhanced the realism and appeal of virtual worlds in movies, TV shows, and video games. Additionally, AI technology has facilitated the automation of media creation processes, such as post-production and video editing. AI systems can analyze and identify trends in audiovisual data, thereby accelerating video editing and improving media production efficiency (Chan-Olmsted, 2019). Advances in natural language processing (NLP) have also impacted the entertainment industry, particularly in automated content creation. NLP algorithms can generate human-like text, including stories and reports, and AI-driven systems can create personalized content at scale to better align with users' preferences and interests. In audio and video production, AI algorithms analyze large data sets to produce multimedia content tailored to user activities on a platform. Machine learning enhances user satisfaction and engagement by understanding preferences and offering personalized recommendations, such as custom playlists. AI-driven technology has enabled the entertainment industry to understand better audience behavior, trends, and preferences through social media data and engagement metrics, leading to more effective long-term marketing strategies (Ahmed et al., 2021).

Music Streaming Services

Historically, music production was primarily in physical albums, such as cassettes and CDs, where artists and producers recorded a collection of songs for sale. As we entered the 21st century, technological advancements revolutionized the music industry. Consumers transitioned from physical formats to digital storage, with MP3 players and iPods becoming popular. The advent of sophisticated smartphones further accelerated this shift, as digital music versions became accessible through various music streaming apps like Spotify, Google Play Music, and Apple Music. These platforms have gradually replaced CDs, significantly altering the consumer experience (Gao, 2021).

Several factors explain the rise of music streaming services, including a growing digital audience, the convenience and accessibility of these services, and evolving attitudes toward online piracy. The internet and broadband connectivity expansion has enabled the widespread use of digital channels for music consumption, leading to a surge in digital music sales (Pastore & Cesareo, 2014). Today, Spotify, founded in Stockholm in 2006, is the most widely used music streaming platform globally. Its rapid growth underscores its economic and cultural significance in the modern era (Vonderau, 2017). According to Spotify's data for the first quarter of 2023, the platform boasts 515 million monthly active users. During the same period, revenue from premium services reached approximately 2.713 million euros, with a 14% increase in revenue and a 17% growth from ad-supported services (Spotify, 2023).

Quality of Service Experience (QSE)

Quality is derived from an individual's comparative judgment process based on their perceptions and thoughtful reflection. It can be assessed in terms of excellence, goodness, need satisfaction, or as a "quality event." Experience, on the other hand, refers to how individuals perceive and interpret events during their interaction with a system, service, or artifact, which affects the quality of experience (QoE) (Egger et al., 2013). QoE, also known as Quality of Service Experience (QSE), measures the degree of satisfaction or dissatisfaction a user feels when using an application or service, influenced by their expectations, personality, and current state.

Several factors impact QSE, including the service itself, content, network quality, device, application, and the context in which the service is used. QSE broadens the concept of service quality to include a user's overall assessment of service performance (Raake et al., 2013). A study by (Reiter et al. (2014) identified three primary factors affecting QSE: human influence factors (user characteristics), system influence factors (attributes such as content type and data transmission), and context influence factors (situational details like time of day and service fees). These factors collectively shape the user's service experience and are linked to their behavioral outcomes. Despite some variation in perspectives, accurately identifying and measuring these specific factors is crucial for understanding and enhancing users' service experiences.

Customer Satisfaction

Satisfaction is a mental state resulting from the interplay between consumer emotions and their expectations about a consumption experience (Oliver, 1980). When the actual outcome of a product meets or exceeds expectations, satisfaction occurs. This positive state can influence consumer behavior, including their intentions and likelihood of remaining a customer (Jr. et al., 2000). Satisfaction can be understood from three main perspectives. First, it is viewed as a dynamic process influenced by various factors, where individuals compare their consumption experiences or outcomes to a set standard. Second, satisfaction is a response triggered by the consumption experience, which can be emotional, cognitive, or a combination. Finally, satisfaction is seen as a process that integrates cognitive and affective elements, where individuals evaluate their experiences by comparing them to a pre-established reference point (González-Rodríguez et al., 2019).

Customer Loyalty

Customer loyalty refers to consumer behavior that is consistently directed towards a particular brand, product, or store over time, often manifested as a pattern of repeat purchases or a high ratio of purchases from the same brand or store (Bustos-Reyes & González-Benito, 2008). Loyalty can be measured using two primary approaches: 1) Behavioral Approach: This approach views loyalty as a behavioral pattern. Consumers are considered loyal if they repeatedly purchase a product or service within a specified period (Suhartanto et al., 2019); and 2) Attitudinal Approach: This perspective defines loyalty as a state of strong devotion towards purchasing products or services, reflecting a deeper emotional commitment (Cong, 2016).

Loyalty intention encompasses more than just the intent to buy; it also includes the intention to recommend and repurchase despite potential price increases (Yoon & Uysal, 2005). This aligns with the Tripartite Theory of Attitude, which posits that attitudes comprise cognitive, affective, and conative elements. According to this theory, consumer intention is part of the cognitive component of attitude. Consequently, loyalty should be assessed based on predictions of future repeat purchases and the intention to promote and endorse the service (Ajzen, 2005).

Perceived Usefulness

Perceived usefulness plays a significant role in influencing customer loyalty to a particular business. It refers to the extent to which consumers believe that a product or service will enhance their lives or positively impact their activities (Amin et al., 2014). Specifically, perceived usefulness is defined as the degree to which a user believes that utilizing a particular system will improve their job performance, positively affecting their intention to use the system (Chen et al., 2007; Ajzen, 1991).

Hypothesis Development

A literature review identifies several key factors influencing consumer satisfaction and loyalty toward music streaming platforms. In both its original and expanded forms, the Theory of Planned Behavior (TPB) suggests that attitudes and social interactions positively affect the intention to use these platforms (Bolduc & Kinnally, 2018; Kinnally & Bolduc, 2020). Emotions also significantly impact consumer satisfaction and behavioral intentions before, during, and after consumption (Barsky & Nash, 2002; Wong et al., 2020; Reynoso, 2010). Cue utilization theory posits that consumer satisfaction is largely determined by the overall product consumption experience (Zhu et al., 2012). Satisfaction reflects the consumer's freedom to choose whether to use or not use music streaming services based on their preferences and needs (Jr. et al., 2000).

Surveys in the e-commerce sector reveal that satisfaction contributes to loyalty in B2C markets, including Malaysia (Ting et al., 2016) and Indonesia (Hidayat et al., 2016). Satisfied consumers are more likely to exhibit loyalty to music streaming platforms. Research shows that service quality and user experience significantly enhance user satisfaction (Lee et al., 2016). Furthermore, the quality of service experience (QSE) notably impacts

satisfaction and the intention to continue using music streaming platforms (Sackl et al., 2012). Based on these findings, the following hypotheses are proposed:

H1: QSE positively influences users' satisfaction with music streaming platforms.

H2: QSE positively influences users' loyalty to music streaming platforms.

Positive emotions can boost consumer satisfaction, enhancing purchase intention and loyalty to music streaming platforms (Hsu et al., 2021). (Fornell, 1992) found that high satisfaction levels lead to increased word-of-mouth recommendations and loyalty. Satisfaction is a precursor to customer loyalty (Seiders et al., 2005; Cooil et al., 2007; Martinez & Caro, 2009). Yi and La (2004) also demonstrated that customer satisfaction positively impacts loyalty. Gupta and Singharia (2021) found that satisfaction and loyalty positively affect music streaming platforms through PLS-SEM analysis. Therefore, the following hypothesis is proposed:

H3: Satisfaction has a direct positive influence on users' loyalty to music streaming platforms.

Additionally, research indicates that satisfaction mediates the relationship between service quality, customer engagement, and loyalty (Dai & Salam, 2019; Gupta & Singharia, 2021; Hsu et al., 2021). Thus, the following hypothesis is proposed:

H4: Satisfaction mediates the relationship between QSE and loyalty in music streaming platforms.

Information quality, including credibility and usefulness, also impacts loyalty. Consumers who perceive a product as reliable and useful are likelier to continue using it. Chau and Ngai (2010) found that perceived usefulness significantly influences consumers' behavioral intentions to persist with technology and services in banks. El-Haddadeh et al. (2012) similarly found that perceived usefulness affects customer loyalty to social networking sites in China. Based on this, the following hypothesis is proposed:

H5: The perceived usefulness of Discover Weekly positively influences users' loyalty to music streaming platforms.

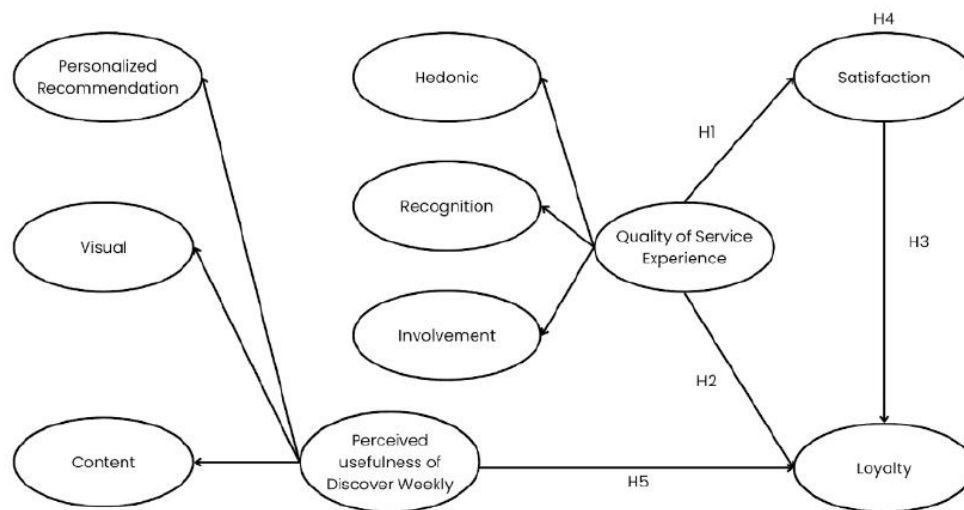


Figure 1. Conceptual Framework

Source: adapted from (Zhang & Zhang, 2022; Zhang, 2019)

B. RESEARCH METHODS

This research investigates factors contributing to customer loyalty towards specific music streaming platforms. The initial phase involved preliminary research to understand the topic. The focus was then placed on exploring how artificial intelligence (AI) technology, particularly through Spotify's "Discover Weekly" feature, can enhance customer experience and foster loyalty among users in Indonesia. Following this, a comprehensive literature review was conducted to define the theoretical framework for the study. This review incorporated a

range of sources, including academic journals, articles, books, and reputable online resources. The literature review facilitated the development of hypotheses that guide the research analysis.

With the theoretical foundation established, the next step involves data collection. This process entails gathering data from a targeted population and sample to assess the impact of Spotify's "Discover Weekly" feature on customer experience and loyalty. The data collection will be carried out in two stages: first, through in-depth interviews, and second, by distributing questionnaires to selected respondents. After collecting the data, an analysis will be conducted to evaluate the findings. This analysis aims to determine how much "Discover Weekly" influences customer experience and loyalty. Finally, the research will conclude with recommendations for future studies and practical implications based on the results of the analysis.

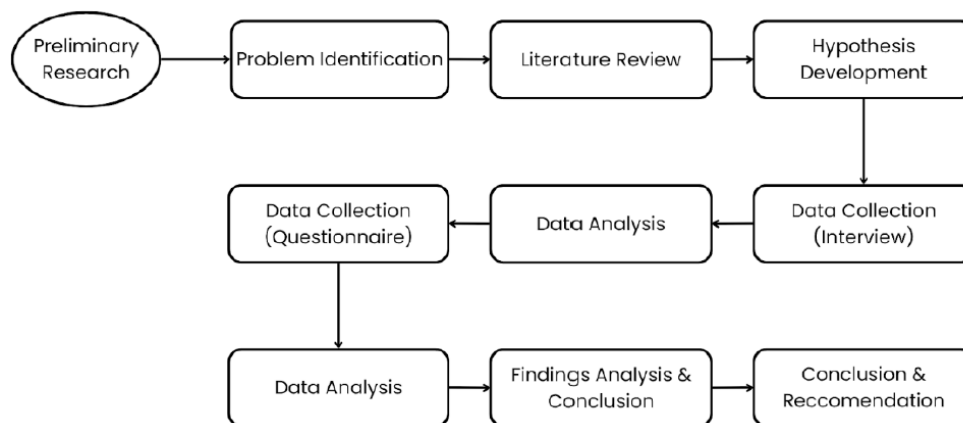


Figure 2. Research Flowchart
 Source: Research data, 2024

Research typically employs two fundamental methods: qualitative and quantitative approaches. This study will utilize both methods to comprehensively understand, combining qualitative insights with quantitative analysis (Van Teijlingen & Hundley, 2002). The qualitative component will involve in-depth interviews on Spotify's "Discover Weekly" feature to gather rich, contextual details. Previous studies suggest that qualitative research should aim for data saturation, with a recommended minimum of 12 responses to ensure comprehensive insights (Vasileiou et al., 2018). Therefore, the study will target at least 12 respondents familiar with and using Spotify, specifically those acquainted with the "Discover Weekly" feature. During the interviews, follow-up questions will be used to explore respondents' experiences and perceptions in greater depth, aiming to minimize biases and enhance the richness of the data collected. The list of interview questions will be provided below.

Table 1. Interview Questions

No	List of Questions
1.	Please share why you chose Spotify as your music streaming platform compared to the others.
2.	What do you know about Spotify's "Discover Weekly"?
3.	Have you ever used Spotify's Discover Weekly feature?
4.	How often do you use the Discover Weekly feature?
5.	Do the "Discover Weekly" recommendations match your song preference?
6.	Do the recommendations help you find new songs you would not find otherwise?
7.	If you can rate from 1-10, how satisfied are you with the Discover Weekly feature?
8.	Has Discover Weekly influenced your decision to continue using Spotify?
9.	Have you ever recommended Spotify to others because of the Discover Weekly feature?
10.	How user-friendly are you with the Discover Weekly feature?

Source: Research data, 2024

To streamline the coding process, the researcher will utilize automated coding with NVivo, leveraging direct quotes from respondents. This approach maintains the integrity of the qualitative data by preserving the original language and phrases, thereby minimizing the risk of misinterpretation (Crosley, 2020). Data triangulation will be employed to ensure the validity of the research findings, including the analysis of interview results, a literature review, and netnography. For the quantitative component, a Google Forms questionnaire will be presented in Bahasa Indonesia to ensure clarity and ease of understanding for respondents. The questionnaire

will be distributed via various social media platforms and employ Likert scales ranging from 1 (strongly disagree) to 6 (strongly agree) in a multiple-choice format. The researcher will conduct a pilot test to confirm the reliability and validity of the questionnaire. Following this, additional respondents will be gathered. To determine the minimum number of respondents, the researcher will use the Slovin formula with a margin of error of 6%. As a result, the minimum number of respondents required is 278.

Table 2. Quantitative Questionnaire Design

Variables	Labels	Indicators	Source
Quality of Service Experience (QSE)	Hedonic (H)		
	H1	Listening to Spotify's Discover Weekly creates memorable moments that enrich my musical experience.	(Cervera-Taulet et al., 2019)
	H2	Discovering music through Spotify's Discover Weekly is an exciting experience.	
	H3	Spotify's Discover Weekly challenges my music preferences by introducing diverse genres and artists.	
	H4	Using Spotify's Discover Weekly is a fun experience.	
	Involvement (INV)		
	INV1	I have control over the music I explore in Spotify's Discover Weekly	(Cervera-Taulet et al., 2019; Schlesinger et al., 2020)
	INV2	I have been involved in the music discovery process with Spotify's Discover Weekly.	
	Recognition (REC)		
	REC1	I feel that my music preferences are taken seriously by Spotify's Discover Weekly	(Cervera-Taulet et al., 2019; Schlesinger et al., 2020)
REC2	I feel that it is important for a listener to use Spotify's Discover Weekly.		
Satisfaction (SAT)	SAT1	I am satisfied with my decision to use Spotify's Discover Weekly for Music Discovery.	(Hwang et al., 2018; Nguyen-Phuoc et al., 2020)
	SAT2	I will continue using Spotify's Discover Weekly in the future.	
	SAT3	I will recommend Spotify's Discover Weekly to others.	
Loyalty (LOY)	LOY1	I would tell other people positive things about Spotify's Discover Weekly.	(Hwang et al., 2018; Nguyen-Phuoc et al., 2020)
	LOY2	I would recommend Spotify's Discover Weekly to others for music discovery.	
	LOY3	I intend to listen to Spotify's Discover Weekly more often.	
	LOY4	I enjoy listening to music more when using Spotify's Discover Weekly.	
	LOY5	I prefer using Spotify's Discover Weekly for music listening to other music streaming services.	
	LOY6	I intend to keep using Spotify's Discover Weekly for my music needs in the future.	
Perceived Usefulness of Discover Weekly	Personalized Recommendation (PR)		
	PR1	When I get a personal recommendation, it increases my experience as a customer.	(Mahike, 2006)
	PR2	Personalized recommendations on the music streaming platform make me more likely to use the platform regularly.	(Derwinis, 2020)
	PR3	Spotify's "Discover Weekly" introduced me to artists, I did not know	
	Visual Presentation (VP)		
	VP1	The interface of Spotify's Discover Weekly looks beautiful and inviting.	(Mahike, 2006)
	VP2	The color scheme of Spotify's Discover Weekly matches my taste.	
	VP3	I think Spotify's Discover Weekly has a wonderful layout.	
	Content (CON)		
	CON1	Spotify's Discover Weekly playlist is fine enough to satisfy my music.	(Mahike, 2006)
CON2	Spotify's Discover Weekly playlist has much good music.		
CON3	It is good to see good music in Spotify's Discover Weekly.		
CON4	I use Discover Weekly to discover new music.		
CON5	Content that Discover Weekly recommends allows me to explore new music genres.		

Source: Research data, 2024

Table 4. Demographic and Behavioral Variable Questionnaire Design

Indicators		Option
Demography	Gender	Male
		Female
	Age	18-21 years old
		22-24 years old
25-27 years old		
Domicile	Bandung; Jakarta; Bogor; Depok; Tangerang; Bekasi; Outside Bandung & Jabodetabek	
Behavior	How long have you used Spotify?	<6 months
		Six months - 1 year
		1-3 years
	Time spent per day on Spotify	>3 years
		<1 hour
		1-2 hours
		2-4 hours
	Do you know Spotify's "Discover Weekly"?	>4 hours
		Yes
		No
Have you ever used Spotify's "Discover Weekly"?		Yes
No		
How frequently do you use Spotify's "Discover Weekly" if yes?	Always (> three times in a month)	
	Sometimes (2-3 times in a month)	
	Rarely (once a month)	
	Never (I do not use it now/never used it at all)	

Source: Research data, 2024

The research will utilize Partial Least Squares Structural Equation Modeling (PLS-SEM) to analyze the hypotheses constructed from the questionnaire distributed online. The latest SMART PLS 4.0 software will be employed, a sophisticated tool for assigning the appropriate metrics to variables and ensuring accurate computations. Additionally, the study will adopt a variance-based approach to structural equation modeling, which is well-suited for examining academic growth within the context of this research.

C. RESULTS AND DISCUSSION

Qualitative Research Result

Based on the interview results, the total number of respondents was 18. The findings indicate that Spotify users who are satisfied with their experiences through the Discover Weekly feature are more likely to engage in positive word-of-mouth, a result validated through triangulation. Consequently, using a quantitative approach, positive word-of-mouth has been introduced as a new variable for further examination. The following additional hypotheses have been proposed:

H6a: Satisfaction has a significant positive influence on positive word-of-mouth in music streaming platforms.

H6b: Satisfaction mediates the relationship between QSE (Quality of Service Experience) and positive word-of-mouth in music streaming platforms.

The conceptual framework will be updated to incorporate these new hypotheses.

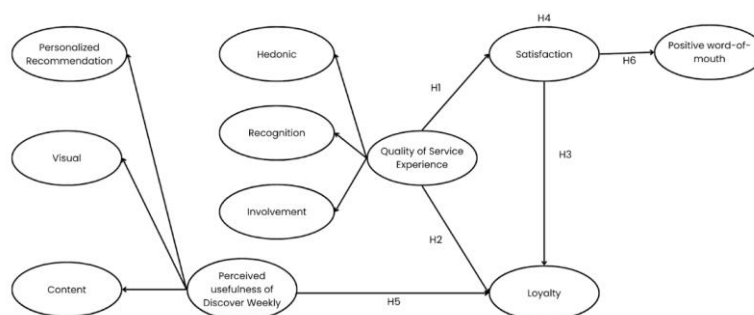


Figure 3. Updated Conceptual Framework

Source: Adapted from (Zhang & Zhang, 2022; Zhang, 2019; Theadora et al., 2022; Khoo, 2022)

Furthermore, the researcher will update the questionnaire design for the newly added variable to the theoretical framework and hypothesis.

Table 5. Updated Quantitative Questionnaire Design

Variables	Labels	Indicator	Source
Positive Word-of-Mouth	Word-of-mouth (WOM)		
	WOM1	I say positive things about Spotify's "Discover Weekly" to others.	(Zhang et al., 2017; Roy et al., 2009)
	WOM2	I introduce Spotify's "Discover Weekly" to other people	
	WOM3	I encourage friends and relatives to use Spotify's "Discover Weekly."	

Source: Research data, 2024

Quantitative Research Result

The total number of respondents collected is 397. The researcher will explore the research topic using the PLS-SEM technique based on the result.

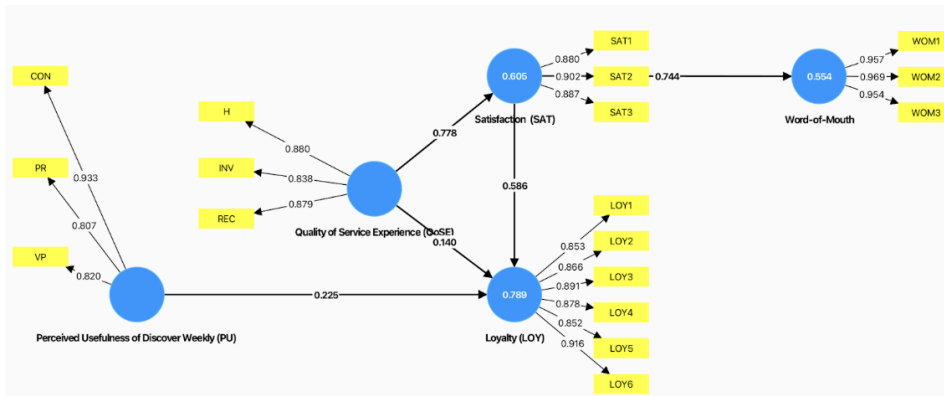


Figure 4. PLS-SEM Result
 Source: Research data, 2024

Internal Consistency Reliability

If the composite reliability is 0.7 or higher, it is generally considered to indicate good internal consistency (Wong, 2013). As shown in Table 6, the composite reliability for all constructs exceeds 0.7, indicating that the measurement model is reliable.

Table 6. Internal Consistency Reliability Result

Construct	Cronbach's alpha	Composite reliability	Reliability
Loyalty (LOY)	0.939	0.952	Reliable
Perceived Usefulness of Discover Weekly (PU)	0.815	0.891	Reliable
Quality of Service Experience (QSE)	0.834	0.900	Reliable
Satisfaction (SAT)	0.869	0.919	Reliable
Word-of-Mouth (WOM)	0.957	0.972	Reliable

Source: Research data, 2024

Convergent Validity

The convergent validity test is the next test that needs to be reported. Table 7. shows that all of the outer loadings from each indicator are greater than 0.60, so all indicators are reliable. Moreover, since all AVEs are greater than 0.70, they have strong convergent validity.

Table 7. Convergent Validity Result

Construct	Items	Factor Loadings	Indicator reliability	AVE)	Validity
Loyalty (LOY)	LOY1	0.853	Reliable	0.768	Valid
	LOY2	0.866	Reliable		
	LOY3	0.891	Reliable		
	LOY4	0.878	Reliable		
	LOY5	0.852	Reliable		
	LOY6	0.916	Reliable		
	PR	0.807	Reliable	0.732	Valid

Construct	Items	Factor Loadings	Indicator reliability	AVE)	Validity
Perceived Usefulness of Discover Weekly (PU)	VP	0.820	Reliable	0.750	Valid
	CON	0.933	Reliable		
Quality of Service Experience (QSE)	H	0.880	Reliable		
	INV	0.838	Reliable		
	REC	0.879	Reliable		
Satisfaction (SAT)	SAT1	0.880	Reliable		
	SAT2	0.902	Reliable		
	SAT3	0.887	Reliable		
Word-of-Mouth (WOM)	WOM1	0.957	Reliable	0.922	Valid
	WOM2	0.969	Reliable		
	WOM3	0.954	Reliable		

Source: Research data, 2024

Discriminant Validity

The next test is discriminant validity. The square root of the AVE value must be greater than the other correlation values between the latent variables. Table 8 shows the result of the discriminant validity using the Fornell-Larcker criterion, which shows that the square root of the AVE value is greater than other correlation values among the latent variables.

Table 8. Discriminant Validity Result

Construct	Loyalty (LOY)	Perceived Usefulness of Discover Weekly (PU)	Quality of Service Experience (QSE)	Satisfaction (SAT)	Word-of-Mouth (WOM)
Loyalty (LOY)	0.876				
Perceived Usefulness of Discover Weekly (PU)	0.777	0.855			
Quality of Service Experience (QSE)	0.770	0.778	0.866		
Satisfaction (SAT)	0.865	0.757	0.778	0.890	
Word-of-Mouth (WOM)	0.779	0.643	0.610	0.744	0.960

Source: Research data, 2024

Collinearity Test

The next step is to do the collinearity test. As mentioned in the previous chapter, the rule of thumb for the variance inflation factor (VIF) should not exceed five and below 3 to avoid collinearity problems. Based on the result in Table 9, almost all loyalty (LOY) indicators' VIF value is greater than three but still below 5, indicating that it might have been uncritical and acceptable. Meanwhile, word-of-mouth (WOM) indicators VIF value is greater than 5, indicating a problem. However, as mentioned in the previous section, loyalty (LOY) and word-of-mouth (WOM) are reflective measurement models. Hence, according to (Hair et al., 2022), VIF values greater than three are generally acceptable in reflective measurement models because high collinearity among the indicators is expected. Indicators in a reflective measurement model are manifestations of the same underlying construct, so they should naturally correlate highly. Overall, all of the VIF value results can avoid collinearity problems.

Table 9. Collinearity Test Result

Indicator	VIF
LOY1	3.179
LOY2	3.303
LOY3	3.668
LOY4	3.234
LOY5	2.977
LOY6	4.576
PR	1.875
VP	1.790
CON	2.704
H	1.931
INV	1.842
REC	2.048

Indicator	VIF
SAT1	2.205
SAT2	2.516
SAT3	2.195
WOM1	5.681
WOM2	7.369
WOM3	5.245

Source: Research data, 2024

Structural Path Significance Results

Table 10 shows the bootstrapping result and that all of the T-statistic values are greater than 1.96, so the model can be empirically supported. Other values that must be considered in order to evaluate the structural model are R² values and predictive relevance. R² values of 0.75, 0.50, or 0.25, respectively, can be described as substantial, moderate, or weak for the latent variables in the structural model (Hair, Ringle, and Sarstedt, 2011). As mentioned in Table 4.3.14, the R² value for satisfaction (SAT) and word-of-mouth (WOM) is greater than 0.50 but less than 0.75, indicating a moderate effect. Meanwhile, the loyalty (LOY) R² value is greater than 0.75, indicating a substantial effect. Additionally, Stone Geisser's Q² is the most commonly used measure of predictive relevance, and it states that the model must adequately predict the indicators from each endogenous latent construct. A Q² greater than zero indicates that the external variable predicts the endogenous variable under discussion.

With the R² and Q² values, the researcher will perform the Goodness of Fit (GoF) analysis to assess the measurement model's predictive efficiency. GoF produces a metric from 0 to 1 by measuring the effect size and convergent validity. The root square of the average of R² multiplies the average of Q² values to get the result of the Goodness of Fit score. After doing the calculations, the root square of the average of R² is 0.805, and the average of Q² is 0.539. Hence, the Goodness of Fit score is 0.439, indicating that the model will likely describe the data.

Table 10. Effects, Variance Explained, and Stone-Geisser

Structural Path	Path Coefficient	T statistics	R ²	Q ²
Perceived Usefulness of Discover Weekly (PU) -> Loyalty (LOY)	0.225	4.262	0.789	0.648
Quality of Service Experience (QSE) -> Loyalty (LOY)	0.140	2.527		
Quality of Service Experience (QSE) -> Satisfaction (SAT)	0.778	32.930	0.605	0.603
Satisfaction (SAT) -> Loyalty (LOY)	0.586	10.826	0.789	0.648
Satisfaction (SAT) -> Word-of-Mouth	0.744	29.175	0.554	0.367

Source: Research data, 2024

F-Square Effect Test

The F Square Effect Test is used to determine the strength of the relationship between two variables, and the effect size must be employed to measure the relevance of binding factors. The effect sizes for small, medium, and high are 0.02, 0.15, and 0.35 (Hair et al., 2019). Table 11 shows the F Square Effect Test result, and it shows that the perceived usefulness of Discover Weekly, loyalty, and quality of service experience have a small effect while the rest of the variable has a large effect.

Table 11. F Square Effect Test Result

Structural Path	F-square	Effect Size
Perceived Usefulness of Discover Weekly (PU) -> Loyalty (LOY)	0.080	Small
Quality of Service Experience (QSE) -> Loyalty (LOY)	0.029	Small
Quality of Service Experience (QSE) -> Satisfaction (SAT)	1.534	High
Satisfaction (SAT) -> Loyalty (LOY)	0.548	High
Satisfaction (SAT) -> Word-of-Mouth	1.242	High

Source: Research data, 2024

Hypothesis Testing

Six hypotheses are proposed in this study, but one of them is for mediating variables. The hypothesis testing procedure uses the inner model path coefficient and significance as T-statistic values indicate. This research uses alpha at 5% (t = 1.96) to test all proposed hypotheses.

Table 12. Hypothesis Testing Result

Hypothesis	Structural Path	Path Coefficient	T values	P values	Result
H1	Quality of Service Experience (QSE) -> Satisfaction (SAT)	0.778	32.930	0.000	Confirm
H2	Quality of Service Experience (QSE) -> Loyalty (LOY)	0.140	2.527	0.012	Confirm
H3	Satisfaction (SAT) -> Loyalty (LOY)	0.586	10.826	0.000	Confirm
H5	Perceived Usefulness of Discover Weekly (PU) -> Loyalty (LOY)	0.225	4.262	0.000	Confirm
H6a	Satisfaction (SAT) -> Word-of-Mouth	0.744	29.175	0.000	Confirm

Source: Research data, 2024

Mediating Result

Satisfaction as a Mediating Variable between Service Experience Quality and Loyalty

Table 13. Total Direct Effect of QSE on LOY

Structural Pathway	Path Coefficient	T-statistics of values	P-value
QSE -> LOY	0.139	2.513	0.012

Source: Research data, 2024

The direct effect of QSE on LOY is significant, with a T-statistic of 2.513 and a p-value of 0.012, indicating a significant positive effect.

Table 14. Indirect Effect of Total QSE on LOY

Structural Pathway	Path Coefficient	T-statistics of values	P-value
QSE -> SAT -> LOY	0.456	10.251	0.000

Source: Research data, 2024

The indirect effect of QSE on LOY through SAT is significant, with a T-statistic of 10.251 and a p-value of 0.000, indicating a significant positive effect.

Table 15. Total Effect of Direct and Indirect Influence

Structural Pathway	Path Coefficient	T-statistics of values	P-value
QSE -> LOY	0.596	11.690	0.000

Source: Research data, 2024

The total effect of QSE on LOY is significant, with a T-statistic of 11.690 and a p-value of 0.000, indicating a significant positive effect. In conclusion, the hypothesis is accepted with partial complementary mediation, where the direct and indirect effects are both significant and unidirectional.

Satisfaction as a Mediating Variable between Service Experience Quality and Positive Word of Mouth

Table 16. Direct Effect of Total QSE on WOM

Structural Pathway	Path Coefficient	T-statistics of values	P-value
QSE -> WOM	0.078	1.205	0.228

Source: Research data, 2024

The direct effect of QSE on WOM is not significant, with a T-statistic of 1.205 and a p-value of 0.228, indicating an insignificant effect.

Table 17. Indirect Effect of Total QSE on WOM

Structural Pathway	Path Coefficient	T-statistics of values	P-value
QSE -> SAT -> WOM	0.532	11.525	0.000

Source: Research data, 2024

The indirect effect of QSE on WOM through SAT is significant, with a T-statistic of 11.525 and a p-value of 0.000, indicating a significant positive effect.

Table 18. Results of the Effect of Total QSE on WOM

Structural Pathway	Path Coefficient	T-statistics of values	P-value
QSE -> WOM	0.609	15.993	0.000

Source: Research data, 2024

The total effect of QSE on WOM is significant, with a T-statistic of 15.993 and a p-value of 0.000, indicating a significant positive effect. In conclusion, the hypothesis is accepted with full mediation, where the indirect effect is significant, but the direct effect is insignificant.

Discussion

H1: Quality Service Experience (QSE) positively influences users' satisfaction with music streaming platforms

The hypothesis that QSE positively impacts user satisfaction in music streaming platforms is confirmed. This aligns with (Zhang & Zhang, 2022), which found that better QSE enhances satisfaction and loyalty. Additionally, (Zhu et al., 2012; Lee et al., 2016) support the idea that high-quality service and experiences increase satisfaction. Interviews indicated that Spotify's "Discover Weekly" feature meets user expectations, confirming that its QSE positively influences user satisfaction.

H2: QSE positively influences users' loyalty to music streaming platforms

The hypothesis that QSE positively impacts user loyalty is confirmed, consistent with (Sackl et al., 2012), which shows that QSE significantly affects user satisfaction and future usage intentions. (Zhang & Zhang, 2022; Gupta & Singharia, 2021) also support this strong relationship. Interviews revealed that Spotify's "Discover Weekly" feature helps users discover new songs, enhancing their loyalty due to the varied music experience.

H3: Satisfaction has a direct positive influence on users' loyalty to music streaming platforms

The hypothesis that satisfaction directly impacts user loyalty is confirmed. Studies by (Ting et al., 2016; Dai & Salam, 2019; Khatib et al., 2019; Seiders et al., 2005; Cooil et al., 2007; Martinez & Caro, 2009; Yi & La, 2004; Sreeram et al., 2017) show that satisfaction is a key factor in loyalty. Interviews indicate that satisfaction with Spotify's "Discover Weekly" feature leads to continued use and loyalty.

H4: Satisfaction mediates the relationship between QSE and loyalty in music streaming platforms

The hypothesis that satisfaction mediates the relationship between QSE and loyalty is confirmed. Studies by (Dai & Salam, 2019; Gupta & Singharia, 2021; Hsu et al., 2021) show satisfaction as a mediating variable among various constructs, including QSE and loyalty. The PLS-SEM results indicate a stronger relationship between QSE and loyalty when satisfaction mediates. Interviews confirm that satisfaction with Spotify's "Discover Weekly" feature enhances the relationship between its QSE and user loyalty.

H5: The perceived usefulness of Discover Weekly positively influences users' loyalty to music streaming platforms.

The hypothesis that the perceived usefulness of Discover Weekly positively impacts user loyalty is confirmed. Studies by (Chau & Ngai, 2010; El-Haddadeh et al., 2012) show that perceived usefulness significantly influences continued use and loyalty. Interviews reveal that users find the "Discover Weekly" feature useful for discovering new music, leading to loyalty.

H6a: Satisfaction has a significant positive influence on positive word-of-mouth in music streaming platforms

The hypothesis that satisfaction positively influences word-of-mouth is confirmed. Studies by (Hsu, 2011; Ruiz-Alba et al., 2021; Reynolds & Beatty, 1999; Choi et al., 2013) show that higher satisfaction enhances positive word-of-mouth. Interviews confirm that satisfaction with Spotify's "Discover Weekly" feature leads to positive word-of-mouth.

H6b: Satisfaction mediates the relationship between QSE and positive word-of-mouth in music streaming platforms

The hypothesis that satisfaction mediates the relationship between QSE and positive word-of-mouth is confirmed. Studies by (Naik et al., 2010; Saleem et al., 2017; Hussain, 2016) show that good QSE, mediated by satisfaction, leads to positive word-of-mouth. Interviews indicate that satisfied users recommend Spotify's "Discover Weekly" feature, enhancing positive word-of-mouth.

CONCLUSION

This study explores the influence of Spotify's "Discover Weekly" feature on user satisfaction and customer loyalty. Based on an analysis of data collected from 397 Spotify user respondents in Indonesia, it was found that a good quality of service experience significantly influences user satisfaction and loyalty. Hedonic experience and

recognition of music preferences by Spotify's algorithm are important factors in improving the quality of service experience. User satisfaction plays a key role with a direct positive impact on user loyalty and acts as a mediator between service experience quality and loyalty. In addition, the perceived usefulness of the "Discover Weekly" feature contributes significantly to user loyalty, where users feel this feature helps them discover new music, which increases their satisfaction and loyalty towards Spotify. The research also shows that user satisfaction drives positive word-of-mouth, where satisfied users will likely recommend Spotify to others.

Based on the research results, some recommendations for Spotify are to improve the quality of the service experience by refining the "Discover Weekly" algorithm to ensure more relevant and personalized music recommendations. The provision of enjoyable hedonic experiences needs to be continuously optimized to increase user satisfaction. In addition, Spotify needs to evolve the "Discover Weekly" feature to be more responsive to users' changing music preferences, utilizing real-time data to provide more precise recommendations. Adding new features that enhance the hedonic experience, such as customized playlists based on mood or activity, can also increase user satisfaction. Regarding marketing, Spotify can leverage user satisfaction for promotional strategies through word-of-mouth. Encouraging satisfied users to share their positive experiences with friends and family can help increase the number of new users. Finally, conducting ongoing research to monitor and evaluate user satisfaction and the effectiveness of the "Discover Weekly" feature is critical to ensuring Spotify remains relevant and responsive to users' evolving needs. By implementing these recommendations, Spotify can increase user satisfaction customer loyalty, and expand their market share in the music streaming industry.

Future research could expand beyond Spotify's "Discover Weekly" feature to include other music streaming platforms like Apple Music and YouTube Music, which also use algorithmic recommendations. As the technology evolves, it is important to analyze its impact on users. Researchers can also explore Spotify's other personalized playlists (e.g., Daylist, Daily Mix, On Repeat, Release Radar) to determine their effectiveness in enhancing user experience and satisfaction. Additionally, this research can be broadened beyond Gen Z to include other age groups like millennials and Gen X, comparing their music preferences and the usefulness of personalized recommendations. Future studies could also investigate other service quality dimensions, such as trust, perceived value, and emotional engagement, to understand their influence on user satisfaction and loyalty in music streaming platforms.

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