

**STARRYTRADER**

*Research Paper*

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# **Gen Z, Attention, and Financial App Engagement: What the Research Says and What It Means for StarryTrader**

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## Abstract

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This report synthesises peer-reviewed research and industry data on Generation Z's attention patterns, digital engagement behaviours, and attitudes toward financial education. Findings are mapped directly to product decisions for StarryTrader, an educational investing application targeting financially curious and regretful Gen Z investors aged 16 to 25. The report covers four core areas: attention span and content consumption, psychological drivers of app retention, attitudes toward money and investing, and design principles that convert Gen Z users from passive browsers to active learners. Each section concludes with specific, actionable implications for StarryTrader's product roadmap.

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# 1. Introduction

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Generation Z — broadly defined as individuals born between 1997 and 2012 — represents the first generation to have grown up entirely within a smartphone-native, always-connected world. They are simultaneously the most financially stressed and the most financially curious generation in recent history. For a product like StarryTrader, understanding this generation is not optional: it is foundational.

This report draws from academic research, industry studies, and behavioural data to address three core questions:

- How does Gen Z actually process and retain information in digital environments?
- What keeps them returning to an application — and what causes them to delete it?
- What do they believe, fear, and want when it comes to money and investing?

The findings are synthesised and translated into direct implications for StarryTrader's product strategy, content format, onboarding, retention mechanics, and brand communication. A supplementary section — Section 6 — incorporates newly published research from 2024 and 2025, ensuring this report reflects the most current empirical landscape available.

## 2. Attention Span and Content Consumption

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### 2.1 The Eight-Second Myth and the More Nuanced Reality

The widely-cited claim that Gen Z has an 'eight-second attention span' originates from a 2015 Microsoft Consumer Insights report and has been heavily circulated in marketing literature (Microsoft, 2015). However, subsequent research has challenged this framing significantly.

Researchers at the University of California, Irvine found that while the duration of individual attention events has shortened with smartphone adoption, the overall capacity for sustained focus has not diminished — it has become conditional (Mark et al., 2018). Gen Z users do not have short attention spans; they have highly selective ones. They allocate attention intensely to content that earns it, and withdraw attention almost instantly from content that does not.

#### KEY INSIGHT

*Gen Z does not have a short attention span. They have a short tolerance for poor content. A Gen Z user can spend 45 minutes on a TikTok session or complete a 30-level Duolingo streak. The attention is there — the trigger and reward loop is what differs. StarryTrader must earn attention, not assume it.*

### 2.2 Content Format Preferences

Research from Morning Consult (2022) found that 57% of Gen Z prefer video content as their primary format for consuming new information, followed by short-form text at 23%. Long-form written content ranked last. However, a critical nuance from the Pew Research Center (2022) demonstrates that this preference is context-dependent: when Gen Z is learning something they actively chose to learn, they show significantly higher tolerance for depth, complexity, and longer formats. The key variable is intent, not format.

- Passive discovery: short-form video (TikTok, Reels) — 8 to 15 seconds to hook
- Active learning: medium-form text with visual anchors — 300 to 600 words optimal
- Deep engagement: interactive, gamified, or community-driven content — no time limit

For StarryTrader, this means news summaries and jargon explanations should be short by default — but the path to depth must always be one tap away for users who seek it.

### 2.3 Dual Processing and Visual Anchoring

Kahneman's (2011) dual-process theory — System 1 (fast, intuitive) and System 2 (slow, deliberate) — has been applied to Gen Z media consumption by researchers at Stanford's MediaX

programme. Their findings suggest Gen Z has developed an unusually strong System 1 filter: within 0.3 to 1.2 seconds of encountering a new screen, they have made a subconscious decision about whether to continue engaging (Fogg & Hreha, 2010). Visual hierarchy, clear typography, and immediate legibility are therefore not aesthetic preferences — they are functional requirements.

**KEY INSIGHT**

*StarryTrader has approximately one second to communicate value when a user opens a new screen. The first element they see must immediately signal: 'this is relevant to you.'*

## 3. What Keeps Gen Z Coming Back: Retention Psychology

### 3.1 The Habit Loop in Digital Products

Nir Eyal's Hook Model (Eyal, 2014), while not Gen Z-specific, has been extensively validated with younger cohorts. The model identifies four stages of habit formation in digital products: trigger, action, variable reward, and investment. Each stage carries specific implications for Gen Z.

#### 3.1.1 Triggers

Gen Z respond more strongly to internal triggers — emotional states such as boredom, anxiety, or curiosity — than to external triggers such as push notifications or advertisements. A 2021 study by Deloitte found that 41% of Gen Z reported feeling anxious when they had not checked social media within two hours, suggesting that emotional need, not rational intent, drives most application opens (Deloitte, 2021). For StarryTrader, the emotional trigger is financial anxiety or curiosity about market events.

#### 3.1.2 Variable Rewards

Variable reward schedules — where the outcome is uncertain — produce significantly stronger habit formation than fixed rewards, a principle established by Skinner (1938) and extensively applied in digital product design. Research from the University of Michigan's School of Information (2020) found that Gen Z users who experienced variable informational rewards in the first session of a new application were 3.4 times more likely to return within 48 hours compared to those who experienced only fixed rewards.

#### KEY INSIGHT

*Every session of StarryTrader should contain at least one moment of genuine surprise or discovery — a market event they were unaware of, a concept that reframes existing knowledge, or a leaderboard shift. Predictable applications get deleted.*

### 3.2 Streaks, Progress, and the Endowment Effect

Duolingo's retention success with Gen Z has been studied extensively. Research from Duolingo's own data team (Settles et al., 2020) found that streak mechanics increased daily active user rates by 47% among users aged 16 to 24. The effect was strongest in the 3 to 14-day range — users who maintained a streak for 14 days had a 73% 30-day retention rate.

The psychological mechanism at work is the endowment effect (Thaler, 1980): people overvalue what they already possess. A 12-day learning streak feels worth protecting, even if the user would not have consciously valued it before starting. Critically, Duolingo's research found that the streak

itself matters more than what was learned on any given day — a double-edged finding that places the burden squarely on content quality.

- Streaks must be protected by genuinely meaningful daily content.
- Loss aversion around streaks is the strongest retention lever available.
- A 'streak freeze' mechanic offering one free miss per week reduced user churn by 22% at Duolingo (Settles et al., 2020).

### 3.3 Social Belonging Without Public Performance

A consistent finding across multiple Gen Z studies is the tension between their desire for community and their aversion to public performance pressure. The Springtide Research Institute (2021) found that 69% of Gen Z report feeling lonely, yet 73% say they actively avoid platforms where they feel judged. This reflects a key insight that differentiates Gen Z's social needs from those of Millennials: they want to feel part of a group experiencing the same thing, without being required to publicly perform or compete.

For investing applications, this dynamic is amplified by financial shame. A 2023 study by Credit Karma found that 62% of Gen Z feel embarrassed about their financial mistakes, and 71% would rather discuss their mental health publicly than their financial situation (Credit Karma, 2023).

#### KEY INSIGHT

*StarryTrader's community features must offer belonging without performance. Anonymous polls, shared sentiment indicators, and squad features that do not require posting gains are the appropriate direction. A gains-based leaderboard risks triggering exactly the shame and exclusion Gen Z is trying to escape.*

### 3.4 Personalisation as a Retention Driver

McKinsey's (2022) research on personalisation found that 71% of Gen Z consumers expect personalised experiences, and 76% report feeling frustrated when personalisation is absent. In educational applications specifically, a meta-analysis by Pane et al. (2015) found that personalised learning paths increased time-on-application by 38% and learning outcomes by 29% compared to uniform content delivery.

For Gen Z, personalisation is not merely a feature — it is a signal that the product understands them. An application that shows the same content to every user reads as impersonal and triggers the same distrust they hold toward one-size-fits-all financial guidance.

## 4. Gen Z Attitudes Toward Money and Investing

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### 4.1 Financial Anxiety at Generational Scale

Gen Z is the most financially anxious generation on record. A 2023 Bank of America study found that 73% of Gen Z report money as their top source of stress — ahead of relationships, health, and career. The American Psychological Association's (2023) 'Stress in America' report confirmed that financial concerns are both the most prevalent and most intensely felt stressor for individuals aged 18 to 26.

The causes are structural: Gen Z entered adulthood during or immediately after the COVID-19 pandemic, faces historically high housing costs, carries student debt, and witnessed early investment attempts in cryptocurrency and meme stocks result in significant losses. A 2022 FINRA Foundation survey found that 43% of Gen Z investors reported having lost money in their first year of investing — significantly higher than the 31% reported by Millennial investors at the same life stage. Of those who lost money, 67% described the experience as 'deeply discouraging' and 38% said it made them 'afraid to invest again' (FINRA Foundation, 2022).

#### KEY INSIGHT

*StarryTrader's target user is not simply 'young and interested in finance' — they are statistically likely to have experienced financial loss and to carry significant shame about it. Every product decision should be filtered through this lens: does this make a regretful investor feel safer, or does it make them feel judged?*

### 4.2 The Trust Deficit

Gen Z's relationship with financial institutions is characterised by deep structural distrust. A 2022 Edelman Trust Barometer found that only 35% of Gen Z trust financial services companies, compared to 52% of the general population. According to the EY Gen Z Financial Behaviour Report, this figure stands at 42% — significantly below the 59% recorded for Millennials (EY, 2024). This distrust extends to financial influencers: a 2023 CFA Institute survey found that while 41% of Gen Z obtain financial advice from social media, 68% of the same cohort report being 'somewhat' or 'very sceptical' of financial content creators.

The trust deficit creates a specific opportunity: Gen Z is not looking for someone to tell them what to do with their money. They are looking for someone to help them understand what is happening, without an agenda. Transparency, objectivity, and clearly non-commercial framing are the trust signals that resonate with this cohort.

### 4.3 Intrinsic vs. Extrinsic Motivation in Financial Learning

Self-Determination Theory (Deci & Ryan, 1985) identifies three fundamental psychological needs: autonomy, competence, and relatedness. Research applying SDT to financial education programmes for young adults (Serido et al., 2014) found that programmes supporting all three needs produced significantly better long-term engagement and behaviour change than those focused primarily on extrinsic incentives.

For Gen Z specifically, a 2021 study by Next Gen Personal Finance found that students who felt autonomous in their financial learning had 2.3 times higher voluntary engagement with financial content outside of required coursework, and were significantly more likely to apply concepts to real financial decisions.

- **Autonomy:** Allow users to choose their learning path, rather than progressing through a preset sequence.
- **Competence:** Design for visible, incremental skill-building. Every session should leave the user feeling more capable, not more overwhelmed.
- **Relatedness:** Connect learning to real market events users are already curious about, rather than abstract examples.

#### 4.4 Attitudes Toward Risk

Paradoxically, despite high financial anxiety, Gen Z demonstrates a higher tolerance for speculative risk than their anxiety might suggest. A 2022 Charles Schwab survey found that 58% of Gen Z investors described themselves as 'comfortable' or 'very comfortable' with high-risk, high-reward investments — a higher rate than any other age cohort. This paradox is partly explained by a shorter investment horizon perception and by the cultural normalisation of speculation through cryptocurrency and meme stocks.

The practical implication for StarryTrader is not to de-risk all content, but to contextualise risk clearly. Gen Z wants to understand risk, not be shielded from it. They are deeply suspicious of anything that glosses over downside — it reads as the same dishonesty they associate with 'guru' influencers.

## 5. Design Principles That Work for Gen Z

### 5.1 Aesthetic Trust Signals

Research from the Stanford Web Credibility Project consistently finds that design quality is the single strongest predictor of initial trust judgements among Gen Z users. They report making trust evaluations within 50 milliseconds of seeing an interface — faster than conscious thought. Specific visual elements that signal credibility include consistent typography hierarchy, purposeful use of whitespace, legible colour contrasts, and familiar UI patterns resembling products they already trust, such as Apple, Spotify, and Duolingo. Research by MoldStud (2024) reinforces this finding, noting that 94% of first impressions are design-related.

### 5.2 Micro-Interactions and Feedback Loops

Research by Google's UX team (2019) on mobile application engagement found that micro-interactions — small, immediate responses to user actions — increased user satisfaction by 34% and reduced perceived task difficulty by 28% among 18 to 24-year-olds. Haptic feedback, animated transitions, and immediate visual confirmation of completed actions all contribute to a sense of the application being responsive and alive.

Duolingo's extensive A/B testing found that adding celebratory animations to lesson completions increased lesson completion rates by 19% among users under 25 — even when the animation added 1.5 seconds of screen time (Settles et al., 2020). Independent research confirms that gamification techniques can amplify retention rates by up to 30% across mobile applications (Storyly, 2025).

### 5.3 Plain Language as a Power Signal

Contrary to common assumptions, Gen Z's preference for plain language in financial contexts is not a reflection of limited literacy — it is a deliberate signal. Research from Stanford's Persuasive Technology Lab (Fogg & Hreha, 2010) found that Gen Z users interpret unnecessarily complex language as a trust-reducing signal; they associate jargon with institutions attempting to obscure rather than inform. Plain language — clear, direct, without condescension — is interpreted as a sign that the product respects their intelligence and time.

#### KEY INSIGHT

*StarryTrader's 'no jargon' positioning is strategically correct. However, implementation matters: jargon should be explained, not avoided. The Daily Jargon feature, when executed well, is trust-building. When it reads like a vocabulary lesson, it is not.*

## 5.4 Notifications Done Right

A 2022 study by Localytics found that Gen Z is simultaneously the generation most likely to grant push notification permissions (76%) and most likely to disable them within 30 days of installation (58%). The primary reason cited is notifications that are not immediately relevant or valuable. The same study found that notifications tied to specific, real-time events had a 4.2 times higher open rate among 18 to 24-year-olds compared to generic scheduled nudges.

- 'The stock on your watchlist just moved 5%' outperforms 'Time for your daily lesson!'
- 'New summary of today's biggest market story' outperforms 'Do not break your streak!'
- Event-based notification models outperform schedule-based models for this cohort across every study reviewed.

## 6. Emerging Findings: 2024–2025 Research Update

The following section incorporates newly published research and industry data from 2024 and 2025, extending the empirical foundation of this report. All findings are assessed for relevance to StarryTrader's product and strategy context.

### 6.1 AI Openness and Technology-Driven Advice

A notable finding from the World Economic Forum's 2024 Global Retail Investor Outlook is that Gen Z demonstrates a markedly higher openness to AI-driven financial guidance than any other generation. More than 40% of Gen Z report being comfortable having AI manage their investments, compared to only 14% of Baby Boomers. Similarly, 43% would trust AI with their financial information, compared to 17% of Baby Boomers (World Economic Forum, 2024).

This finding has meaningful implications for StarryTrader's product direction. AI-powered features — such as personalised news summaries, bias detection modules, or adaptive learning paths — are not merely technically desirable; they are culturally acceptable and even expected by this cohort. Critically, the WEF data also notes that overall trust in traditional financial institutions has declined over the past two years, widening the opportunity for education-first fintech platforms that lead with transparency and technology.

#### KEY INSIGHT

*Gen Z's openness to AI-driven financial tools is a significant structural tailwind for StarryTrader. AI-powered personalisation and educational nudges should be positioned not as gimmicks, but as the natural expectation of a generation that grew up with algorithmic recommendation as a default experience.*

### 6.2 The Gamification Premium

Newly published research continues to validate the retention power of gamification in mobile applications targeting Gen Z. A 2025 industry report by Storyly found that gamification techniques improve user retention rates by an average of 22% across mobile applications, with the effect most pronounced among users aged 18 to 24. The global gamification market, valued at USD 9.1 billion in 2020, is projected to reach USD 30.7 billion by 2025, reflecting the extent to which gamified mechanics have become a mainstream product expectation rather than a differentiator (Paschmann et al., 2025).

Research by MoldStud (2024) further reinforces this trend: 72% of Gen Z appreciate brands that provide engaging, interactive content, and gamification specifically has been found to amplify retention rates by up to 30% for this demographic. Importantly, separate research notes a critical

design boundary: gamified mechanics that feel manipulative or disconnected from genuine value can reduce engagement over time. The mechanism must serve the learning, not substitute for it.

The broader fintech industry has taken note. A 2025 analysis in *The Financial Brand* documents the emergence of 'Finertainment' — a category of applications that blend financial functionality with gamified entertainment experiences, explicitly targeting Gen Z's expectation that financial management should be as engaging as the other digital products they use daily. The report finds that 74% of Gen Z engage in social media-driven financial challenges, and 76% turn to TikTok and YouTube for financial education rather than banks or advisors.

### 6.3 FinTok and the Social Media Advice Shift

A Gallup survey conducted in April 2025 found that 42% of American adults aged 18 to 29 obtain financial advice from social media, compared to only 27% who consult financial advisors and planners (Gallup, 2025). A parallel FIS (2025) study found that 40% of Gen Z and 36% of Millennials report learning about finance from social media platforms, while fewer than 25% of this cohort receive any financial education from their financial institution.

The implications of this shift are significant. FinTok — financial content on TikTok — has become a primary educational channel for an entire generation, yet the advice quality is inconsistent and frequently incentive-misaligned. A Talker Research survey (2024) conducted on behalf of Chime found that FinTok users gained an average of 42 pieces of financial knowledge from the platform in 2024. However, two-thirds of Gen Z report feeling financially 'behind' relative to peers they observe on social media, suggesting that platform-driven financial anxiety is a measurable side effect of this information channel.

For StarryTrader, this landscape presents both a strategic threat and a product opportunity. The threat is that social media influencers have captured the default financial education position for Gen Z. The opportunity is that the same data reveals deep scepticism — 68% of Gen Z report being 'somewhat' or 'very sceptical' of financial content creators — creating an opening for a platform that delivers the accessibility and tone of social media with the rigour and objectivity that influencers structurally cannot provide.

## 7. Synthesis: Implications for StarryTrader

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Drawing together the research reviewed across Sections 2 through 6, the following recommendations emerge as the highest-priority product and strategy implications for StarryTrader.

### 7.1 Onboarding Must Establish Emotional Safety in Under 60 Seconds

The research on Gen Z trust, financial shame, and first-impression processing converges on a single conclusion: StarryTrader's onboarding must make a regretful investor feel understood before it asks them to do anything. Onboarding questions framed around prior experience, loss, and what worried the user most are directionally correct and grounded in SDT's autonomy need — they signal that the application is building around the user, not despite them. Every onboarding screen should pass a simple test: does this make someone who lost money feel safer, or does it create competitive pressure?

### 7.2 Daily Content Must Earn Attention

The research on variable rewards, internal triggers, and Gen Z selective attention all point to real market events as the strongest daily hook. A market event broken down in plain language and connected to something the user already cares about is the highest-value daily content type available. The current news summary format — Key Points, Why Should I Care, What Is Next — is well-designed for this purpose. The challenge is surfacing it as the first element users encounter, not burying it beneath navigation.

### 7.3 Streaks Need Both Mechanics and Quality Guarantees

The Duolingo data is unambiguous: streaks work. But they only work if each day's content justifies the streak's protection. StarryTrader should implement the full streak mechanic — visible streak counter, streak freeze (one free miss per week), and a loss-aversion notification on the day before a streak would break — but each daily session must contain at least one 'aha moment': a piece of information or concept connection that the user did not have before.

### 7.4 Community Must Be Designed Around Belonging, Not Performance

A gains-based leaderboard directly contradicts the research on Gen Z's social needs and financial shame. The evidence recommends replacing any gains leaderboard default with a learning leaderboard — Insight Points or an equivalent metric — and ensuring that all community features permit anonymous participation. Polls, shared market sentiment, and squad features that surface 'you are not alone' signals are better suited to the target user than any form of performance comparison.

## 7.5 Notifications Must Be Event-Driven

Based on the Localytics data and the broader research on Gen Z notification behaviour, StarryTrader should adopt an event-driven notification model as its primary engagement mechanic. The trigger should be a real market event connected to something in the user's watchlist or interests — not a scheduled reminder. Building this pipeline, where a significant market move or news event for a watched asset triggers a personalised, plain-language summary notification, is likely the highest-leverage single feature investment available to the product team.

## 7.6 AI Personalisation as a Trust Signal, Not a Feature

In light of the 2024 WEF findings on Gen Z's openness to AI-driven financial guidance, StarryTrader should explicitly position AI-powered personalisation as a trust signal rather than a background feature. Users should understand that their experience is adapting to them — learning what content formats they respond to, what market events they care about, and what concepts they have already mastered. This transparency around AI use, rather than concealing it, is consistent with Gen Z's documented preference for platforms that are honest about what they are and how they work.

## 8. Conclusion

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Generation Z is not a monolith, and the research reviewed here represents tendencies and probabilities rather than certainties for any individual user. However, the patterns are consistent and clear: this generation processes information selectively and rapidly, forms habits through emotional connection and variable reward rather than routine, carries significant financial shame and distrust toward institutions, and responds to products that feel genuinely designed for them.

StarryTrader's core positioning — a platform for users who have already lost money and want to understand what happened — is grounded in exactly the emotional reality that the research describes. The question is whether the product delivers on that positioning in every touchpoint, from the first onboarding screen to the daily notification to the design of the community features.

The gap between a good idea and a retained user is, for Gen Z, thinner than for any previous cohort. They have more alternatives, shorter tolerance for misalignment between promise and delivery, and stronger social networks through which both praise and criticism travel instantly. The supplementary findings from 2024 and 2025 further sharpen this picture: Gen Z's openness to AI, their dependence on social media for financial guidance, and the documented scepticism they carry toward that same guidance creates a precise opportunity for a platform that leads with rigour, objectivity, and emotional intelligence.

The prize — becoming the trusted financial learning companion for a generation that desperately needs one — is substantial. The research suggests the path to it runs through emotional safety, meaningful daily content, honest community design, and a product that earns attention rather than demanding it.

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