

The Role of Emotional Intelligence in Internet of Things Advertising

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Abstract

Globally, organizations spend billions on advertising annually. Those advertisements are creating a world of advertisement overload. Internet of Things advertising (IoT Ad) presents an opportunity for firms to stop bombarding consumers with useless adverts and start addressing the actual needs and wants of consumers. Effective (IoT) Internet of Things Ads will allow consumers and products to communicate in ways never before possible. It is the promise of IoT. However, this promise is hindered by consumers' lack of willingness and trust to reveal personal information to advertising agents. Here comes the role of emotional intelligence to help. With relevance and trust, consumer willingness to respond to advertisements can increase.

In this proposed paper, aiming to examine the psychology of consumers' willingness to respond to advertising and what kind of frameworks need to be achieved for advertisers to break down the posture of current advertising overload was necessary.

To begin to embrace the empathy, intelligence, and genuine relationship potential of emotional intelligence in Internet of Things Ads. As, It is proven that emotional intelligence helps communicate with consumers' feelings and gives Internet of Things ads the ability to understand, empower, and bring relevance enhancing adherence, loyalty, and satisfaction to consumers. In doing so, there will be a unifying factor that will add to the seamless future possibilities of interaction driven by IoT devices in a growing ecosystem of Smarty Things.

In the future, copy testing and audience segmentation accuracy would also be further enhanced by the measurement of likeability, reaction, and the seven functional needs using sensors, such that logical and emotional strategies would be preferred for emotional reactions; and creative robustness, content market fit and socio-political issues be further understood for likeability measurements.

Keywords

Emotional Intelligence ; Internet of Things ; Internet of Things Advertising ; User Experience ; consumers behaviors'

المستخلص

على الصعيد العالمي، تتفق المؤسسات المليارات على إعلانات سنوياً. تخلق هذه الإعلانات عالماً من الإعلانات الزائدة. يمثل إعلان إنترنت الأشياء (IoT Ad) فرصة للشركات للتوقف عن قصف المستهلكين بإعلانات عديمة الفائدة والبدء في تلبية الاحتياجات والرغبات الفعلية للمستهلكين. ستسمح إعلانات إنترنت الأشياء الفعالة (IoT) للمستهلكين والمنتجات بالتواصل بطرق لم تكن ممكنة من قبل. وهذا هو دور إنترنت الأشياء. ومع ذلك، فإن هذا الدور يعوقه افتقار المستهلكين إلى الرغبة والثقة في الكشف عن المعلومات الشخصية لشركات ووكلاء الإعلان. وهنا يأتي دور الذكاء العاطفي للمساعدة. ومع الملاءمة والثقة، يمكن أن تزداد رغبة المستهلك في الاستجابة للإعلانات.

في هذا البحث المقترح، كان من الضروري دراسة سيكولوجية استعداد المستهلكين للاستجابة لإعلانات إنترنت الأشياء ونوع الطرق والأساليب التي يتعين على المعلنين تحقيقها لكسر موقف الحمل الإعلاني الزائد الحالي. لذلك تم البدء في احتضان الذكاء العاطفي وإمكانيات العلاقة الحقيقية للذكاء العاطفي في إعلانات إنترنت الأشياء. كما ثبت أن الذكاء العاطفي يساعد على التواصل مع مشاعر المستهلكين ويمنح إعلانات إنترنت الأشياء القدرة على الفهم والتمكين ولتلائم وتعمل على تعزيز الانتماء والولاء والرضا للمستهلكين. ومن خلال القيام بذلك، سيكون هناك عامل موحد من شأنه أن يضيف إلى إمكانيات التفاعل المستقبلية السلسلة التي تقودها أجهزة إنترنت الأشياء في النظام البيئي المتنامي للأشياء الذكية.

في المستقبل، سيتم أيضاً تعزيز الاختبارات والاحصائيات وطرق تقسيم الجمهور بشكل أكبر من خلال قياسات الإعجاب ورد الفعل والاحتياجات الوظيفية السبعة باستخدام أجهزة الاستشعار الذكية، بحيث يتم تفضيل الاستراتيجيات المنطقية والعاطفية لردود الفعل العاطفية؛ والقوة الإبداعية. لذلك يجب ملاءمة سوق المحتوى والقضايا الاجتماعية والسياسية وفهمها بشكل أكبر لقياس مدى الإعجاب ورد الفعل والاحتياجات لتطبيقها في هذا النوع من الاعلانات.

الكلمات الرئيسية

الذكاء العاطفي ; انترنت الأشياء ; إعلانات إنترنت الأشياء ; تجربة المستخدم ; سلوكيات المستهلكين

Introduction

Today's data are transformed using the potential of the internet, and in this way, new capabilities and services are emanated. One of the new abilities leading to revolutionary transformations in almost all areas is the field of Internet of Things. The Internet of Things is the concept that the entire world will be equipped with "intelligence" and communication capability, and all objects will exchange information with either each other or humans. Advertising is also one of the major players of the field of Internet of Things. The Internet of Things provides the means for products used to advertise either itself or their sponsoring companies without any direct human intervention. Although companies have many opportunities about the vehicles of advertising, and products become the vehicles of their own advertisements, the consumers to whom the advertisements are addressed are bombarded with advertising messages and do not have time to evaluate most of the messages inadvertently. Therefore, companies have to develop a more interactive advertising alternative than using only the products being advertised as the advertising vehicle themselves. The firms have to establish a more emotional connection between the target consumer and the product being advertised, so that the firm can arouse the interest of the other party and direct its interest to the company's own business. In other words, the stage should not eliminate the effect of the performance. In addition to all these advantages,

if companies are able to make emotional analyses about those who are likely to view their advertisements or products, they can also optimize their emotional strategies on the internet and through the emotional content of the messages. Because the analysis of those emotions from data expressed is a difficult task and the dimensions of analysis are very complex, the need for other parameters has emerged. The present study focused in this regard.

The constantly changing market conditions stimulate organizations to develop a new competitive edge in marketing. The Internet of Things is the vehicle that binds together the strengths of the components of various marketing strategies, and realizing its capacity and potential with information and data collected from various sensors and applications. The complexity of these data leads to the task of analyzing its emotional qualities. If emotional intelligence enters the marketing area of knowledge, many new dimensions will be opened. The aim of the present evaluation study is to attract attention of the business world to the new business opportunities brought by the Internet of Things in advertising.

Background and Significance

Since smart computing, multimodal database management, context-awareness, and immersive visual broadcasting (e.g., augmented reality) technologies have improved user cognition, IoT advertising is also expected to bring about extended cognition in embedded user-vendor communication. It is widely accepted that advertising can directly impact consumer cognition, and consumer acceptance of various advertising themes is based on their individual orientations. Emotional intelligence, a relatively stable personal trait, has been suggested to play a significant moderating role in the effectiveness of emotional advertising. However, few studies have examined the relationship between emotional intelligence and IoT advertising. The recent cognition-increasing features of smart computing, multimodal database management, context-awareness, and immersive visual broadcasting technologies suggest that some affective qualities of GSM advertising may extend to the cognitive pattern of IoT advertising. Therefore, we believe that emotional intelligence may also have extended effects on the IoT advertising synthesis process. (Jadhav and Kalita2023)

2019 has been a peak year for the development of the Internet of Things (IoT). By connecting numerous sensors, actuators, and smart devices, IoT is driving several commercial innovations that induce extended integrations of lives and devices for users. According to Ericsson Mobility Report, the number of IoT devices connected to mobile networks is expected to exceed 4.1 billion by 2024. Unlike other internet-based services, the IoT has invasive characters since most sensor-driven smart devices are closely integrated with their users and create a more extensive device-user relationship. Benefitting from enhanced device-user network connectivity, the IoT can efficiently exchange dynamic notifications and visual information with their device users. This feature connects the IoT and other global scale social media (GSM) services, such as Facebook, Twitter, and WeChat, which derive advertising revenues from addressing the personalized interest of end users. (Albreem et al., 2023)

Research Objective

A growing number of studies on emotional intelligence come from psychology, social psychology, and management. In the last decade, the use of emotional intelligence has started to be examined in many fields like healthcare, computing, tourism, and now the Internet of

Things and advertising. Nowadays, machines and other devices are created in a form that works with sophisticated software to serve people's wants and needs. The future is envisaged as a connective net that has been called the Internet of Things, taking today's internet. In the Internet of Things concept, various devices can exchange data like phones and refrigerators via the internet.

The research towards developing products for IoT and exposing these products to the consumer can be manipulated quickly by taking into account emotional intelligence. Organizations will thus understand the market better by evaluating the IoT devices for emotional intelligence and making appropriate decisions.

Research Methodology

The purpose of this study is to investigate the impact of emotional intelligence on advertisements as a moderator variable in the relationships of perceived retentiveness, attitude, and behavioral intention in advertising for the usage of Internet of Things products. The method used in this research is based on a cross-sectional design where data is captured at one point in time.

The method development was an exploratory and qualitative approach that was suitable as a precursor to quantitative research. The qualitative research provides information, insights, and suggestions to stimulate unlike ideas, choices, and alternatives. The dependent variables for this study are attitude and behavioral intention to use the Internet of Things. The independent variables in the study are perceived retentiveness in Internet of Things advertising and emotional intelligence in advertising in Internet of Things.

Literature Review

It has been analyzed and proven that there are still some gaps in literature in the context of using emotional intelligence as a sustainable tool for IoT advertising. There are many previous papers that have investigated mostly theoretical and general knowledge about brand awareness, branding, global behavior, especially EQ in B2B context rather than B2C. However, there is no single work that can reveal what exactly a regular consumer feels or demonstrates when reading IoT advertising, and neither can it define sustainability based on readiness levels or predict the featured durability, strength of brave heart, or vulnerability to aggressive impact or product damage.

The aim of the research is to show the role of customer's emotional intelligence in reacting to the emotions delivered by IoT advertising.

The review of literature presents the approach to the problem. The theoretical background shows what is related to the main research subjects.

The empirical part of the article covers the material, methods, descriptive statistics, and evaluation of factor analysis. The research ends with the discussion of what could be applied based on that particular case limitation as important directions for future investigation.

Understanding Emotional Intelligence

Emotional intelligence is an essential human capability associated with the ability to manage not only one's own emotions, but also those of others. By understanding and addressing emotions, people can manage their own feelings more effectively and effectively guide those

of the people around them. Emotional intelligence can be divided into different areas like the ability to perceive and understand one's own emotions, the ability to deal with one's own emotions, the ability to perceive and understand the emotions of others, the ability to deal with others' emotions, and the ability to manage the emotions of a group of people. But what determines whether or not a person gets the job done? In diverse areas, emotional intelligence is five times more important than phrasing or managing information. These are not just viewpoint predictions. The business scale had 35 crucial skills (FACETS) that revealed emotional intelligence. These scales are part of an organization's business practices. (Goleman, 2021)

Definition and Components

Emotional intelligence (EI or EQ) refers to the ability of people to recognize their own emotions and those of others, to differentiate between emotions and to label them appropriately, and to use emotional information to guide thinking and behavior. It has been noted that EI, alongside quantitative and analytical intelligence, is critical to achieving success in the workplace and in relationships, as well as generally in all facets of life. (Doan et al.2020)

Recent years have seen increased focus on the emotional depth of consumers in a number of digital advertising contexts. For instance, emotions are found to play an important role in mobile advertising and reviews, on social networking platforms such as Snapchat, among females, and on YouTube, where emotional and impact values show large positive relationships with user engagement. Building knowledge of emotional intelligence and its importance in the general scope of marketing is increasingly important for understanding consumer behavior and cognition in digital advertising, including responses in IoT campaigns.

Emotional intelligence is generally considered to contain four main components: i) perceiving emotions, where the ability to detect emotions in one's surroundings and recognize them is key; ii) using emotions to facilitate thought, where a person uses emotional cues and information to cope with life's complexities and think more about their feelings; iii) understanding emotions, which involves the skills of comprehension of what emotions mean, and understanding complex relationships between multiple emotions; and iv) managing emotions. This involves the removal of certain emotions, and the rectification of others to manage mood states. (Sharp et al., 2020)

Emotional intelligence theory further posits that the conscious ability to control and direct one's emotions in varying contexts has a significant impact on personal and professional success. Individuals with high EI outperform their low EI counterparts in a myriad of job-related contexts and industries, often finding employment in areas with extensive interpersonal contact. Differences in emotional intelligence and their corresponding comparisons can have significant theoretical and practical implications. (Sinha et al.2022)

In terms of theoretical research, further research has called for additional strategies, control processes, and meta-results residing at the intersection of the active EI concept and cognition in general. These could better elucidate the nature of EI and the processes it encompasses, as well as more generally define the adaptive nature of complex cognition in which emotions remain a central feature. In terms of practical implications, emotional abilities account for 58% of variation in job performance and have been linked with enhanced job-related attitudes,

successful teaching, improved officer performance among special forces, and enhanced social functioning. (Diener et al.2020)

With this in mind, the concept of EI is central to promoting successful adaptation in individuals and elevating human performance to higher levels.

Importance in Advertising

In connection to the Internet of Things, advertising was only studied by Kuplicar, Kurs-Etchegoyen, and Sarasa (2015). Their results provide evidence on the relationships among individual differences in emotional intelligence, persuasion knowledge, and consumer vulnerability to utilitarian and hedonic advertising messages. Alawneh, Salloum, and Ashuri (2018) analyzed the influence of emotional intelligence on consumer behavior in Internet research.

As there is no previous research on the impact of emotional intelligence (EI) on both agent and recipient results in Internet of Things advertising, and only two recent pieces of research focus on the form, structure, and results of Internet of Things advertising with an Applied Econometrics approach and co-creation, this work focuses on studying the impact of EI on advertising in the Internet of Things.

The main contribution of this study is analyzing whether participants who responded to the Self-Report Emotional Intelligence Test would react in the same way regardless of the unit of the advertisements or would be influenced by EI, which would have different impacts on the agent of the transaction. These would also be derived from a decision that affected their response time in answering the questions. Participants are not only mere recipients but also take the role of agents through an Internet of Things device. In regard to the importance of advertising, research in the field adheres to three main theories: Functionalist (Papavasileiou, 2009; Young and Lim, 2016), Dominance (Hofacker and Belanche, 2006), or Combined theories (Aaker, Heslop, and Norris, 2004) which are not well known. (Dui et al.2024)

Internet of Things (IoT) and Advertising

Over the coming years, the increasing number of items that are connected to the Internet of Things (IoT) will provide business opportunities. It will bring changes to both personal behavior and economic patterns, and it is expected to affect the area of advertising. Advertising research on Internet protocols is abundant, focusing on practical topics, and studying Internet protocols for advertising. However, in the growing commercial world in which such topics are expected, studies considering individual level are relatively insufficient. Research on how IoT can be utilized in the decision process of individuals and its possible results, rather than what IoT does, is limited. The focus of this study is to reveal the role of Emotional Intelligence in the effects of advertising strategies in interactive advertising on the IoT, and on the change of perspective that such use may create for consumers. (Kopetz and Steiner2022)

With the rapid change in the global economy, companies need to look to different advertising strategies with the values of Internet advertising. With that, consumers searching for brands with high quality, functional and emotional values in their internet advertisements find an opportunity. For consumers, how to use the internet to come together with the products in the store since they prefer to approach the product in a practical way. And behind the consumer, the decision process functions effectively.

The formation of different decision-making mechanisms can have a profound effect on the flow of money, transactions, and sales. In the advertisement of IoT, Emotional Intelligence, which is a concept that brings together and coordinates technology and human factors, is important in terms of brands and companies offering products and services, as well as from the consumers' perspective. Advertising of new IoT forms should aim at brand conditions such as forming a foundation of trust, doing more striking work, and offering products. With that, consumers may experience more intense feelings and a more realistic experience by interacting. However, how can this relationship be sustained and enhanced? With the use of advertising strategies that evolve over time, especially the website, they are a critical winning argument. When using the website of the first IoT product on the market in the advertising process, when creating the product, what kind of perspective, interaction, assistance, investment and experience does the consumer need and expect in this context? The form and content of the website? These are constraints that need to be examined in this new market. Research on such purchases and why they occur is an integral part of understanding and interpreting the behavior of consumers who make purchases with new site experiences. In general, the emotional and mental values that a product brings to the consumer are important components of brand advertising. However, the website they prefer is very limited. For now, most studies focus on purchase intentions, the importance of the website space, or customer satisfaction with the website, as well as providing experiences, the implications of various website designs, tonalities and creative aspects. Advertising exists and is being analyzed to focus and shape thousands of companies in terms of creating promotional work. The emotional perspective that advertising will aim to form depends on the existing product features and what kind of master plan they need to be to form more intense feelings permanently and eventually trigger them. The design, number, emotions created, expectations set for IoT advertisement of the website, and decisions to be made at this point depend on current advertising studies. (Guitart & Stremersch, 2021)(Falcão & Isaías, 2020)

Definition and Applications of IoT in Advertising

It is a new trend of the future that all companies implement the Internet of Things (IoT) in their business models to maintain a competitive advantage. Through the IoT, organizations collect data on the usage of products and services, analyze them, and make business decisions to improve their business activities as they offer users something that fewer competitors can at the time. In advertising, the role of the IoT is also significant for advertising activities, meeting the personalized needs of customers.

Through the IoT, companies can collect data on product use to design advertising that is more relevant and personalized to users. The more companies choose the IoT for their business activities, the more they understand their customers and, in turn, the better and more precise their advertising will be. However, the IoT, as a product usage data-collection system, as well as related functionalities, may collect some customers' data that is considered private. Therefore, we address how the dimensions of individual emotional intelligence influence customer risk perceptions when they receive personalized advertising due to the IoT. As advertising becomes more personalized, information privacy seems to be put into a different perspective. (Koohang et al.2022)

The IoT is the 'network of physical objects, devices, vehicles, buildings, etc., that are embedded with electronics, software, sensors, and network connectivity, which aims to collect information from multiple sources and adapt to various situations. The data that is obtained through the IoT is made up of human behavior, business activities, personal behavior, personal health, social behavior, and health management. This data collection serves various field applications, such as education, payment, environment, and disaster monitoring. The IoT is the technology behind the entire collection of data transformed from sensor and output processes through connected systems to provide situational intelligence and adaptive decision-making abilities. The entire sensor is constructed to collect data from anything it is assigned to be worked in, such as clothes, shoes, watches, phones, refrigerators or cars. This data collection that is connected to the system then makes it possible to use data to direct customers directly to their desired domains. When individuals require something about their health, workouts, behaving inside the house, scheduling the drink time, learning a new aspect of art, visiting a beach, scheduling work tasks, or preparing for a certain design dress to join a special event, this data intelligence process is still assisting them in happiness. After the requests are delivered to the people, they cannot replace the required time or purchasing the specified product. (Liu & Tao, 2022)(Chanal & Kakkasageri, 2020)

Intersection of Emotional Intelligence and IoT Advertising

Emotional Intelligence

Mayer and Salovey (1997, p. 10) developed a hierarchical model of EI based on the four-branch model that precedes it. In practical terms, authors have managed to create an instrument named the Mayer-Salovey-Caruso Emotional Intelligence Test (MSCEIT). This instrument is specially designed to measure EI, which resulted from the MEIS model.

The MEIS model comprises four branches and 15 competencies - perceiving emotions, using emotions, understanding emotions, and managing emotions. Authors argue that the MEIS model explicitly outlines on what grounds EI must be developed. Man, Patil, Chaubey, and MP (2017, p. 126) report that research has shown that emotionally competent people react much more flexibly in changing circumstances than emotionally incompetent people. (Odukoya and Olowookere2020)

Emotional Intelligence in Advertising

Burton, Goldring, and Arnott (2012) report on extensive Internet advertising spending from 2004-2010, showing that focusing more on advertising competences might present an attractive trait of businesses that sustain economic growth. They recommend that when companies endeavor subtle and tough challenges in the innovative world, they should invest in advertising competences that tap the complexities of advertising operations. Those competences are sometimes very much emotional or emotional intelligence related (Didic, Goreta, & Ljubicic, 2019; Man et al., 2017). While traditional CRM systems concentrate on customer history transactions such as sales or complaints, there is a marked interest in emotional behavior analysis for the purpose of recommendations. A small number of articles proposed automatic profiling of user interests (Chrenko & Bieliková, 2015; Bieliková, 2014). Far more articles propose elaborate methods to infer user emotions and then implement these emotions in faceted and personalized recommendations. (Faruk et al., 2021)

Enhancing User Experience

When one talks about innovative advertising, it's hard not to talk about user experience and the impact it has on the targeted public. Throughout the years, the user experience is growing as a key factor in business strategy and companies working in an increasingly competitive environment seem to have already realized the importance of fostering positive experiences.

Internet of Things integrated with Emotional Intelligence® (EI) frameworks enable better, more sensitive, and more empathetic interaction with the people, touching their feelings and causing an impact in real time, providing the tools to better advertising creation, i.e., that measure and evaluates the effectiveness of the different approaches and provide real-time feedback of user emotions within the ad value chain.

Since the development of better-gearred advertising to audience's feelings and emotions, appeal directly and consciously not only for functional but also for emotional points, the definition of emotion, its categories and typology are established, and revision of affect detection strategies. Finally, if integral and holistic marketing strategies are accomplished, consumers tend to develop feelings such as trust in brands and build relationships with those, thus supporting the development not only of a good user experience but also turning them into loyal consumers. (Young et al.2020)

Implications and Future Directions

In the IoT era, the advertisement business model needs to be real and practical. However, in a future filled with technology, it is important to remind ourselves that advertising is a way of communicating key insights to shape human behavior and decision-making. IoT will change somewhat about advertisement; we also argue that its importance may be permanent. As long as companies sell products and services, they will need to inform and persuade potential consumers.

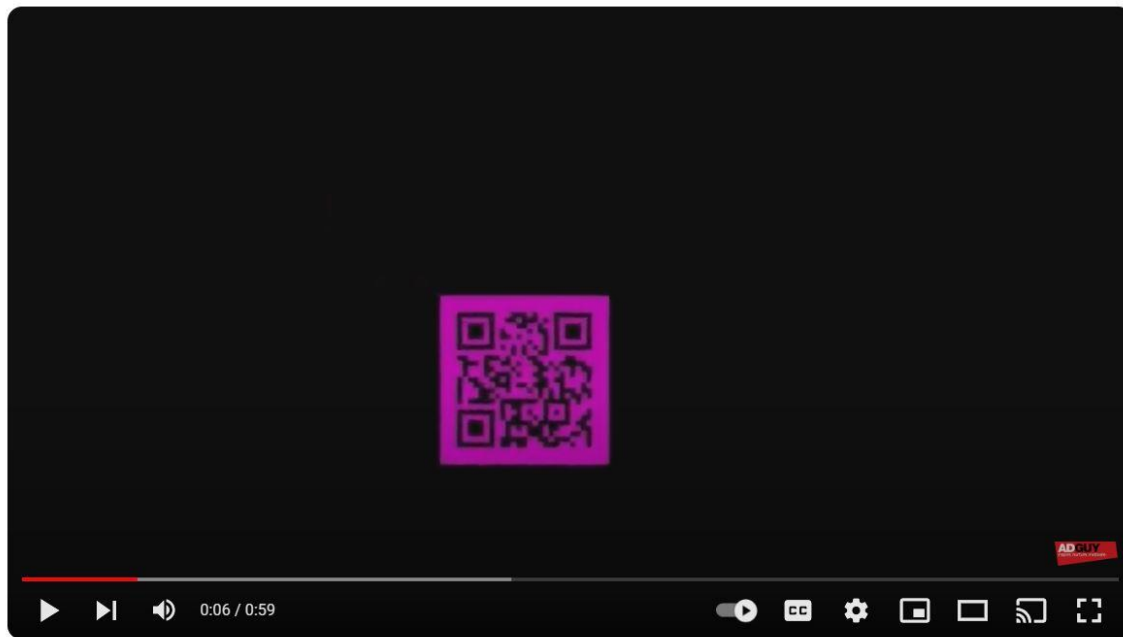
Practical Applications in Advertising and How They Benefit Businesses

Advertising is no longer only about creating an image. The new buzzword in advertising today is 'influencing'. In the dynamic and ever-evolving world we live in, the customer has transcended the realm of naivety and ignorance. In fact, the majority of customers in today's era are exceptionally astute, possessing an inherent understanding of what to purchase and precisely where to procure it from, as long as they encounter the right factors that will sway their decision-making process. These influential factors, contrary to popular belief, are not limited to the brand's image or the mere mention of its name; rather, they revolve around the profound connection the customers feel towards the product.

This is precisely where marketing experts endorse the significance of tapping into emotions. In the intricately interwoven fabric of marketing, it becomes clear that the ultimate choice lies not in what lies beneath the surface, but rather in what strikes a chord within the deepest recesses of the human heart.

This realm of emotions plays an incredulously powerful role in contemporary marketing practices, as it decisively determines the magnitude of exposure and coveted position within the hearts and minds of millions of impassioned viewers.

Practical & Case Studies

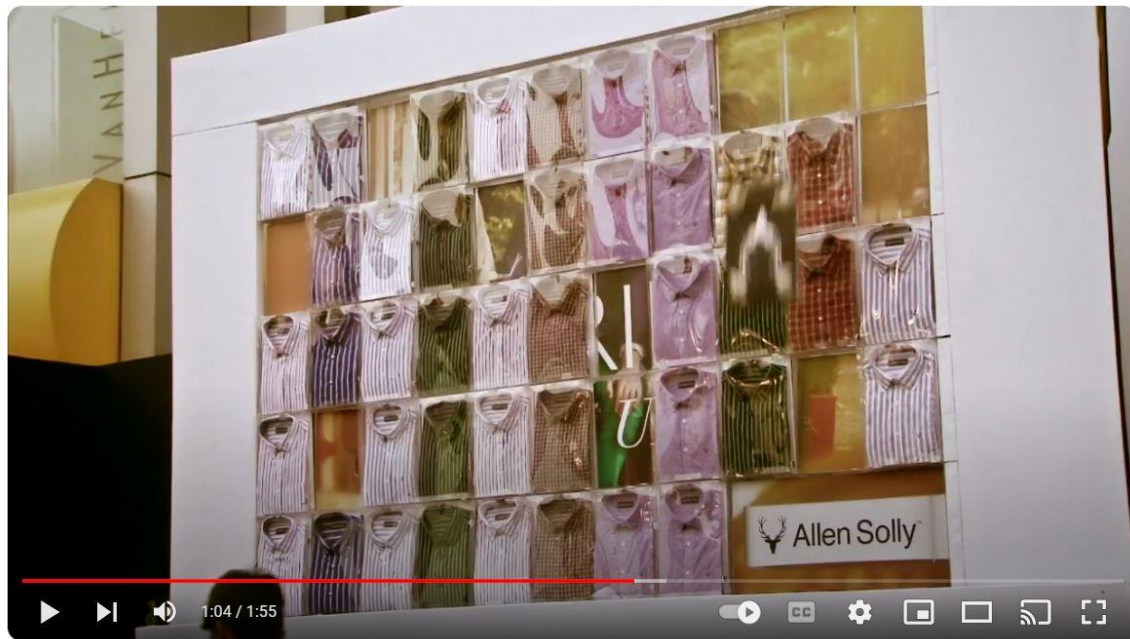


Coinbase QR Code Super Bowl Ad

FIGURE 1: COINBASE QR CODE SUPER BOWL AD

TABLE 1: COINBASE QR CODE SUPER BOWL AD ANALYSIS

Ad QR Code	
Brand/Product Name	Coinbase
Publishing Year	2022
Target Audience	Super Bowl Fans
Ad Analysis/Message	Coinbase is a cryptocurrency exchange platform, they shared its commercial during the 2022 Superbowl, some viewers were confused while others were mesmerized. Their one-minute ad featured a QR code bouncing around a black screen, playing on the emotional connection of nostalgia that made the consumers remember the "DVD" logo on older TVs – with eerie background music. When viewers used their smartphone's camera to the QR code, they were directed to the platform's websites where they were offered \$15 for signing up and downloading the app. QR codes are considered gateways to IoT devices and allow brands to find creative but affordable ways to market their products and services. The commercial was so successful that the website crashed.



The first ever Tweepole-Powered collection launch by Allen Solly

FIGURE 2: THE FIRST EVER TWEETLE-POWERED COLLECTION LAUNCH BY ALLEN SOLLY

TABLE 2: THE FIRST EVER TWEETLE-POWERED COLLECTION LAUNCH BY ALLEN SOLLY AD ANALYSIS

Ad QR Code	
Brand/Product Name	Allen Solly
Publishing Year	2012
Target Audience	A & B Class
Ad Analysis/Message	Allen Solly, a clothing brand, created an interactive shirt billboard in a mall in Bangalore, India. Using IoT, they connected social media hashtags with products giveaways. To launch the new Autumn Winter collection, they went social and carried out 'India's first Tweepole powered billboard!' There are 52 Fridays in a year, and 52 Shirts were up for grabs. There were 10 hashtags, and the first five people to tweet with the right hashtag won a shirt from Allen Solly's latest collection. As users tweeted the right hashtag which was #RainingSolly, the computer linked to the billboard would choose a solenoid (the coil wound behind a shirt) to push a shirt off the billboard for a random consumer to win. Allen Solly found a unique way with an emotional intelligent concept that played on engagement to encourage consumers to share their brand on social media, while enabling people to engage as a community in person, as well.

Case Studies Examples

Firstly, it is important to note that the Morgan Stanley/Gartner (Morgan, 2024) Internet of Things infrastructure coverage, also known as IoT 50, is being utilized in this context. This particular framework has been chosen due to its relevance and applicability in the field. It serves as a valuable resource for understanding the sector and the companies that operate within it.

In the scope of IoT-EI, Emotional Intelligence in the Internet of Things, specific sectors have been identified for further examination. Among these sectors, there are specific companies that have been carefully selected for their significance and use as exemplars. These chosen companies serve to illustrate and highlight the concept of Emotional Intelligence within the realm of IoT.

The selection process for these exemplars involves thorough evaluation and consideration of various factors. It encompasses the assessment of their operations, impact, and contributions within the IoT sector. Additionally, their embodiment of Emotional Intelligence principles and practices is also taken into account.

The justification for including these exemplars lies in their ability to showcase the potential and capabilities of Emotional Intelligence in IoT. By analyzing these companies and examining their strategies, practices, and implementations, valuable insights can be gained. These insights can then be applied to further enhance the understanding and utilization of Emotional Intelligence within the broader Internet of Things landscape.

In conclusion, the deployment of the Morgan Stanley/Gartner IoT 50 framework, in combination with the careful selection of sectors and companies, enables a comprehensive exploration of Emotional Intelligence in IoT (IoT-EI).

The chosen exemplars serve as powerful examples, shedding light on the significance and practical applications of Emotional Intelligence within the ever-evolving Internet of Things ecosystem.

Secondly, using actual, theoretical, and related resources, IoT-EI is examined on a conceptual character, and the use in the IoT is explored. It is suggested that IoT-EI is valuable to firms seeking to better understand, interpret, manage, and operate their businesses under IoT environments.

The selected sectors and their companies require a detailed illustration of their current position within the IoT. A hypothetical position is an important first step; however, its limitations are also to be made clear. To clarify, this is an example of research using an observed, actual position, set of companies, and sectors. Such a direct and empirical undertaking is inherently case-like in nature. This new form of real-world, multimedia case study.

In order to provide an evidence-based view, the most recent financial and operational data has been researched for these companies, and every effort has been made to ensure that this is unbiased, relative to the time of reporting. The most frequently used reports list and provide brief profiles of the estimated top 50 companies for IoT network and communication infrastructure. (Khanh et al.2022)

Conclusion

With such rapid changes happening in the advertising industry with Internet of Things (IoT) integrated with multi-sensory technologies, emotional intelligence will be the solution to identifying newer metrics, dimensions, and methods to measure and enhance advertising effectiveness. From traditional advertising where attitudinal and purchase intentions are the only measures to now as IoT is increasingly adopted, increased digital retargeting combined with multi-sensor technologies and A/B testing of different production elements (like zero moments of truth) and various advertising production methods in real time would require better understanding to measure these deep content variables such as matching up and collating the seven function needs of the advertising with that of the consumers to guide future advertising personnel on creative production. The collaboration of such capabilities of interest in creative solutions, user experience and user interface design, and content marketing will be able to lead a significant commercial imperatives and value for media clutter optimization and ROI. These data-driven creativity, real-time interaction, and in-depth view of advertising will open up endless advertising mixed-media opportunities.

With the advent of IoT and connected consumer, there is now the possibility of seeking and leveraging the consumer's emotional involvement and participating in brands and their regular user activities by utilizing emotional intelligence with empowerment and relationship management with these technically astute consumers. In the future, copy testing and audience segmentation accuracy would also be further enhanced by the measurement of likeability, reaction, and the seven functional needs using sensors, such that logical and emotional strategies would be preferred for emotional reactions; and creative robustness, content market fit and socio-political issues be further understood for likeability measurements. The complexity that multi-sensory integrated and user-generated contents bring may also necessarily require multitasking and cross collaboration between traditional advertising executives, professional advertising personnel, cognitive scientists, psychologists, and market researchers to understand and liaise with the likes and dislikes of these new age connected consumers.

Key Findings and Contributions

In this proposed paper, we aim to examine the psychology of consumers' willingness to respond to advertising and what guardian frameworks need to be achieved for advertisers to break down the posture of current advertising overload and begin to embrace the empathy, intelligence, and genuine relationship potential of IoT Ad. It is our hope that this research will pave the way for future heterogeneous IoT Ad systems that can communicate with consumers' feelings in mind, with the ability to understand, empower, and bring relevance enhancing adherence, loyalty, and satisfaction. In doing so, there will be a unifying factor that will add to the seamless future possibilities of interaction driven by IoT devices in a growing ecosystem of Smarty Things.

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Figures

Fig. 1: Coinbase QR Code Super Bowl Ad, Retrieved 05 Aug 2024 from <https://www.youtube.com/watch?v=uJ9pNQrz0fA>

Fig. 2: The first ever Tweepole-Powered collection launch by Allen Solly, Retrieved 05 Aug 2024 from <https://www.youtube.com/watch?v=8eHt6CVUILL>

Tables

Table 1: Coinbase QR Code Super Bowl Ad Analysis, Created by the researcher

Table 2: The first ever Tweepole-Powered collection launch by Allen Solly Ad Analysis, Created by the researcher