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SKEPTICISM TOWARDS ADVERTISING AND AD-BLOCKING IN THE POSTDIGITAL ERA

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Skepticism Towards Advertising and Ad-blocking in the Postdigital Era

Dijital Çağda Reklamlara Yönelik Şüphecilik ve Reklam Engelleme Yazılımları

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1) Adblockers
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4) Consumer Behavior
5) Digital Communications

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LIST OF ABBREVIATIONS

AAT	Advertisement Avoidance Technology
AD	Advertising
CFA	Confirmatory Factor Analysis
CFI	Comparative Fit Index
CPA	Cost per Acquisition
CPC	Cost Per Click
CPC	Cost per Leads
CPM	Cost per Impression
CPS	Cost per Sales
CR	Composite Reliability
DVR	Digital Video Recorder
GFI	Goodness of Fit Index
HTML	Hypertext Markup Language
ISP	Internet Service Provider
JS	JavaScript
MSV	Maximum Shared Variance
NFI	Normed Fit Index
PC	Personal Computer
RMSEA	Root Mean Square of Error Approximation
TLI	Tucker-Lewis Index
TV	Television
URL	Uniform Resource Locators

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ABSTRACT

This study examines the effects of skepticism toward advertising in the use of ad-blocker software. A theoretical model in predicting a consumer's likelihood in using ad-blocker software has been proposed and tested. Then, an online survey was used to gather data, to which 212 people responded. This data was then analyzed for statistical significance in predicting a given consumer's likelihood of using ad-blocker software. The model is shown to be significantly more effective in this prediction with a 72.3% correct estimation rate.

Skepticism toward advertising with regards to digital media is an area that has not been extensively covered in academic literature. This study aims to fill this gap in the literature, while also proposing future research that could ultimately benefit consumers and advertisers alike via re-establishing fields of marketing communications. Achieving such, would be a net benefit for all parties involved without the need to resort to software that unselectively blocks interparty relationships with consumers and corporations.

This study proposes an original model to predict a given consumer's likelihood of using ad-blocker software. The model in question incorporates various factors that are linked to consumer attitude and behavior that commonly were considered for advertising in the traditional media.

Technical disciplines and technical branches of disciplines such as marketing and communications will benefit from a cognitive look at digital consumer behavior as most human action stems from human psychology to begin with. Thus, this study aims to have implications to a wide variety of disciplines in re-establishing the channels of communication for advertisers and consumers in the digital and non-digital media alike.

Keywords: Adblockers, Advertising Avoidance, Skepticism, Consumer Behavior, Digital Communications

ÖZET

Bu çalışma, reklam engelleyici yazılımların kullanımında reklama yönelik şüpheciliğin etkilerini incelemektedir. Bir tüketicinin reklam engelleyici yazılım kullanma olasılığını tahmin etmeye yönelik teorik bir model önerildi ve test edildi. Ardından, veri toplamak için 212 kişinin yanıtladığı çevrimiçi bir anket kullanıldı. Bu veriler daha sonra, belirli bir tüketicinin reklam engelleyici yazılım kullanma olasılığını tahmin etmede istatistiksel anlamlılık açısından analiz edildi. Modelin bu tahminde %72,3 doğru tahmin oranı ile önemli ölçüde daha etkili olduğu gösterilmiştir.

Dijital medya ile ilgili olarak reklamcılığa yönelik şüphecilik, akademik literatürde kapsamlı bir şekilde ele alınmayan bir alandır. Bu çalışma, literatürdeki bu boşluğu doldurmayı ve aynı zamanda pazarlama iletişimi alanlarını yeniden kurarak nihai olarak hem tüketicilere hem de reklamverenlere fayda sağlayabilecek gelecekteki araştırmaları önermeyi amaçlamaktadır. Bunu başarmak, tüketiciler ve şirketler ile taraflar arası ilişkileri seçici olmayan bir şekilde engelleyen yazılımlara başvurmaya gerek kalmadan ilgili tüm taraflar için net bir fayda olacaktır.

Bu çalışma, belirli bir tüketicinin reklam engelleyici yazılım kullanma olasılığını tahmin etmek için orijinal bir model önermektedir. Söz konusu model, geleneksel medyada reklam için yaygın olarak düşünülen tüketici tutum ve davranışlarıyla bağlantılı çeşitli faktörleri içermektedir.

Pazarlama ve iletişim gibi teknik disiplinler ve disiplinlerin teknik dalları, dijital tüketici davranışına bilişsel bir bakış açısıyla fayda sağlayacaktır, çünkü insan eylemlerinin çoğu en başta insan psikolojisinden kaynaklanmaktadır. Bu nedenle, bu çalışma, dijital ve dijital olmayan ortamlarda reklam verenler ve tüketiciler için iletişim kanallarının yeniden kurulmasında çok çeşitli disiplinlere çıkarımlar yapmayı amaçlamaktadır.

Anahtar Kelimeler: Reklam Engelleme, Reklamdan Kaçınma, Şüphecilik, Tüketici Davranışları, Dijital İletişim

INTRODUCTION

Despite the radical advances in consumer access to various sources of product & service information, advertising remains a most important tool for marketing communications. A healthy communication landscape within advertising leads to better informed consumers (Clemons, 2019). Well informed consumers, in turn, make better purchase decisions for themselves, the society, and the world (Kenning & Plassmann, 2008). This process also provides the necessary initiative for companies to engage in consumer-focused innovation & research (Awan & Zuriat-ul-Zahra, 2014). However, as competition for markets increases, the noise in advertising tends to follow. To ensure effective delivery of communication messages, advertisers turn to strategies that can bypass advertising noise. These strategies often result in advertising that is strongly resented by consumers.

The issue is heavily exacerbated by the digital age. With the arrival of new media technologies, consumer preferences shift towards digital media (Bruns, Highfield, & Lind, 2012). Digital advertising is expected to account for more than half of global advertising revenue in 2021 (Dentsu, 2021). However, as digital media, unlike traditional media, is often consumed on personal devices, consumers tend to have a higher degree of involvement. They often describe the experience as intrusive, annoying, or invasive (Miroglio, Zeber, Kaye, & Weiss, 2018). The consequence is a steady rise in the use of consumer tools called “ad-blockers”.

Ad-blockers are software programs that completely block digital advertising on a variety of personal devices, such as PC’s or smartphones (Morrison & Peterson, 2015). They are expected to cause a $78 billion damage to the global advertising industry, causing a loss of roughly 20% of all digital advertising revenue in 2021 (PQ Media, 2020). This damage alone is enough of an initiative for all publishers and advertisers to take ad-blocking seriously. However, research on ad-blockers and why consumers use them have so far has taken a supply side perspective and focused on developing technologies to deter or prevent ad blocking. Demand-side

perspective focusing on factors that influence consumers' use of ad-blocker software is lacking. This thesis addresses this void.

As ad-blockers ultimately are software programs, they are easily tracked. The number of people who use ad-blocking can also be easily measured. Publishers and advertisers, in turn, focus on forcing consumers to stop using them. However, consumers consistently used strategies in the past to avoid conventional advertising (Ferreira, Michaelidou, Moraes, & McGrath, 2017). They were only harder to measure, if not impossible.

It is highly likely that the use of ad-blockers is not the underlying problem but is a symptom. Thus, it is especially important to uncover factors that lead consumers to use ad-blocker software. Research shows that consumer resistance towards advertising is traditionally rooted in skepticism towards advertising (Obermiller & Spangenberg, On the origin and distinctness of skepticism toward advertising, 2000). The literature on this topic is rich. However, not much research has been done on how skepticism is linked with consumers' tendency to use ad-blocker software. This research aims to shed light on how consumers' skepticism towards advertising is linked to the use of ad-blocker software while exploring additional factors such as attitude towards authority and advertising resistance strategies.

Research Problem, Thesis Question & Objectives

This study aims to answer whether an underlying distrust toward advertising influences the consumer use of ad-blocking software. To this end, the study objective is to shed light on future research areas in effectively alleviating the damages caused by ad-blocking software to all parties involved. It is the premise of this study that consumers too are being negatively affected by missing out on advertising communications. Thus, figuring out methods that are not forceful in their nature to overcome the need of using ad-blocker software is ultimately aimed by this research.

Significance of Study

Ad-blocker software in academic literature is commonly studied from a technological perspective, both in the fields of marketing and computer science. While this approach situationally could incorporate behavioral tangents such as user experience and consumer path to purchase, the narrative demands that the digital presence of a consumer – their avatar – is the subject of research, rather than the consumer themselves. This study tries to remove the digitally bound aspects of ad-blocker software from the equation. Instead, the digital phenomenon that is ad-blocker software, is investigated to understand underlying factors of consumer behavior in the digital era.

Conceptual Framework

The conceptual framework in this thesis consists of several constructs proposed to predict the consumer's likelihood of using ad-blocker software. The constructs are mainly measured using scales that were adapted from well accepted scales in the literature. Nonetheless, these scales are firstly tested for reliability with the target group of the conducted research, then are dimensionally reduced through exploratory factor analysis. The resultant factor scores were then entered in statistical analysis as exploratory (independent) variables.

The constructs that are taken into consideration in this thesis are as follows: skepticism toward advertising, attitude toward advertising, advertising avoidance toward conventional advertising, attitude toward ad-blocker software and conformity to power. For one of these constructs, namely, attitude toward ad-blocker software, an original scale has been developed and tested for the purpose of this study.

The thesis also considers respondents' demographic characteristics namely, gender, income, education, and age.

Overall, the conceptual framework tries to predict ad-blocker use through metrics that are cognitive in their nature, rather than technical or exclusively digital, as could be found extensively in the literature on ad-blocker software.

Structure of the Thesis

This thesis is structured in a manner in which the literature leading up to the rise of the ad-blocker phenomenon is examined as a precursor. Consumer behavior plays a key part in the wide adoption of ad-blocker software. Thus, it is of critical importance that the historical consumer attitude toward advertising in eras where such software did not exist may shed light onto why consumers are turning to battle advertising. Key frameworks for skepticism toward advertising and advertising avoidance are therefore detailed in the conceptual framework.

Furthermore, to uncover whether this consumer resistance is merely isolated in the field of advertising or not, other behavioral patterns – such as an individual's conformity to power are examined as well.

Previous literature on ad-blocker software makes up the rest of the literature review and the theoretical background, leading up to the research design of the thesis.

Section 2 of the thesis presents an overview of the literature, providing the theoretical background necessary to position the current study in context. Section 3 discusses the main research constructs of this thesis, followed by the research model and hypotheses in Section 4, and the methodology in Section 5. Then, research findings are presented in Section 6, followed by a revised model in Section 7. Conclusion and discussion follow in Section 8.

1. LITERATURE REVIEW

The literature review for this thesis is formatted in a way that examines the necessary factors and the underlying causes for ad-blocker software to be commonly used today by consumers. The literature on ad-blocker software is also

summarized following this categorical section. This structure is a key element for the purposes of this study, since it is of high importance to recognize why consumers feel attacked by advertisements and why advertisers feel threatened by the widespread use of ad-blocking software.

1.1. Theoretical Background

1.1.1. Advertising Effectiveness

For the purposes of this study, it is necessary to understand the changes in the subject of digital advertising and how advertising on digital media evolved throughout the last 25 years. Consumer behavior and attitude toward advertising with regards to ad-blocker use co-develop with how the advertising industry treats consumer data. Thus, the literature reviewed for this study consists of multiple factors that are shown to advance online advertising in a certain direction where tracking consumer action and behavior became the norm. Literature in consumer privacy, skepticism toward advertising, and consumer attitudes toward authority in general are taken into consideration. Measuring advertising effectiveness, however, appears to play a large role in this transformation (Torres-Romay, 2022). Therefore, the historical advances in effectiveness measurement will also be given detailed inspection.

Advertising is commercial mass communication designed to promote the sale of a product or a service, or to deliver a message on behalf of an institution or organization (will be referred to as advertisers) (Stanton, 1984). To this regard, advertising is a form of information exchange that heavily counts on being effective. The effectiveness of advertising, in turn, relies on the cognitive and behavioral responses of consumers who are targeted by the advertisers (Rajeev & Stayman, 1990). Measuring this effectiveness plays a pivotal role for advertisers and other parties which are engaged in the business of advertising. It is demonstrated that companies which correctly measure and build on advertising effectiveness also perform much better in other vital areas such as product innovation (Chandy & Tellis, 1998). Product innovation, in turn, provides massive

and long-lasting positive effects in companies' financial performances (Chandy & Tellis, 1998).

Measuring advertising effectiveness relies on measuring consumer actions, reactions, and perception (Lavidge & Steiner, 1961). Following the digitization of the commercial landscape the capability of advertisers to measure these factors radically changed. Moreover, the definitions of the factors have also undergone a significant transformation. A modern definition of advertising includes many relatively new factors such as media, audience, and consumer actions as goals (Wijaya, 2012). During this time substantial research on consumer behavior, advertising and management literature also appeared (Harmancioglu, Finney, & Joseph, 2009). Understanding how these factors were regarded and measured before and after the digital revolution is necessary to understand the true implications of the ad-blocker phenomenon.

In the literature of traditional advertising effectiveness measurement, consumer action typically refers to purchase (Palda, 1966). Thus, to measure consumer action, advertisers traditionally relied on sales results. Following a standard model of communication, advertising is a type of information exchange where the sender is the advertiser, and the receiver is the consumer (Shannon & Weaver, 1949). Until the start of the digital era in which social media became prevalent, advertising was also strictly unidirectional (Rodgers & Thorson, 2000). Not only did consumers not have the ability to engage in two-way communications with the advertisers, their cognitive and behavioral responses could also not be directly assessed. This limitation significantly hindered advertisers' ability to measure advertising effectiveness. During this period advertisers, agencies, and to some extent media outlets, commonly resorted to sales results to assess the effectiveness of advertising (Lucas & Britt, 1963).

Taking variance in sales results as a performance indicator, however, is historically criticized in academic literature as sales performance cannot solely be attributed to the effectiveness of advertising (Lavidge & Steiner, 1961). Unless sales do happen

and are measured immediately, other factors such as price, consumer access and competitive landscape could universally affect the results. These factors play significant roles in determining whether an advertised product or service sells more or not, especially in mid and long-term data (Palda, 1966). Besides being multivariate, relying on sales results are also seen to neglect the theory of reasoned action in terms of consumer behavior (Lavidge & Steiner, 1961). This approach considers purchase, as the action in question, to be mostly a result of deliberate consumer intention.

1.1.2. Impulse Purchases and Short-Term Sales

Historical research regards the effects of most advertising to be long-term (Lavidge & Steiner, 1961). Immediate sales results, even if measurable at the time, were regarded to be painting an incomplete picture in terms of effectiveness before the digital era (Lavidge & Steiner, 1961). In their 1961 paper "A Model for Predictive Measurements of Advertising Effectiveness" Lavidge and Steiner consider a "Buy Now" ad an extreme example (Lavidge & Steiner, 1961). A "Buy Now" ad, limited to an in-store application, is explained as a contrast to most industrial advertising which is not intended to stimulate immediate purchase. Lavidge and Steiner later proceed to put forth a sequence of effects consequential to the perception of an advertisement; consisting of knowledge, liking, preference, conviction and finally purchase. This model exclusively reputes purchase as the ultimate consumer action which is the result of a sequence of steps. Moreover, the model favors advertising more likely than not to generate results in the long-term. In academic literature and business practices alike, Lavidge and Steiner's model have been of paramount importance for a very long time. Commonly referred to as "the consumers' purchase journey" the model was kept relevant until very recently. The book "Digital Strategy" by the media conglomerate WPP includes a version of Lavidge and Steiner's model 60 years after its publication (JWT, 2006). Impulse purchases are not explained by and omitted from the original and adapted models. Lavidge and Steiner regards impulse purchases as purchases consummated with no previous awareness, knowledge, liking or conviction with respect to the product or the

service, thus, effectively classifying immediate sales results as a viable metric for only advertisements aiming to achieve impulse purchases.

In the years following Lavidge and Steiner's work many scholars have taken a keen interest in impulse purchases (Harmancioglu, Finney, & Joseph, 2009). It is demonstrated that purchases which could be considered as impulse purchases make up a larger part of overall purchases (Rao & Laverie, 2004). Some factors that explain this transformation are, but not limited to, widespread multi-brand retail stores, the rise of e-commerce and easier access to loans and credit cards by the consumers. Since the start of the 21st century, not only do impulse purchases happen more often, but they also seem to be happening for more expensive products or services (Rennie, Protheroe, Charron, & Breatnach, 2020). Research shows that the search term "best" overtook the search term "cheap" worldwide around the year 2004 (Rennie, Protheroe, Charron, & Breatnach, 2020). The same dynamics hold true in virtually all languages when the terms are translated to local languages. Besides, while the precise meaning of "cheap" is shown to be singular, the precise meaning of "best" can have a wide range of components such as value, quality, performance, or popularity. This transformation in consumer behavior also translates into a much quicker decision cycle for many transactions. Research shows that even a fictional brand, which has never been seen by a consumer, can manage to instantly win 28% of shopper preference over well-established brands given the right composition of an advertisement focusing on the benefits (Rennie, Protheroe, Charron, & Breatnach, 2020).

1.1.3. Impulse purchases in digital media

The importance of measuring advertising performance has proven to be exacerbated even more so with the introduction of social media. Global spending in advertising is projected to have grown to a record number of $876 billion in 2022, directly affecting the importance of research (Insider Intelligence, 2022). Transient or augmented "shoppable" ads on social media are also demonstrated to play a role in this transformation. Unlike the social media era, consumers today can directly purchase a product or a service by interacting with the advertisement. To this end,

it is demonstrated in both practice and the recent literature that impulse purchases and other short-term decision making by consumers are not insignificant (Harmancioglu, Finney, & Joseph, 2009).

Regarding short-term sales as an effectiveness metric, the current academic consensus is that understanding whether immediate sales results can be an effective way of describing advertising effectiveness, relies on correctly pathing the consumer decision making process that leads up to the sale (Wenlong, Yan, & Ding, 2020). Recent research shows that in the context of impulse purchases, consumer intentions and presumptions no longer play as large a role in consumer action (Harmancioglu, Finney, & Joseph, 2009). Instead, factors such as consumer excitement appear to have a more direct influence. Unlike the linear model of consumer decision making by Lavidge and Steiner, newer models such as the "Messy Middle Model" by Alistair Rennie and Jonny Protheroe, describe impulse purchases as "unexpected terminations" of complicated consumer decision making journeys (Rennie, Protheroe, Charron, & Breatnach, 2020). These models consider more of the purchase decision as impulse purchases, regardless of the length or complexity of the consumer journey. Academic literature also discusses that there is no empirical support that consumers go through each stage of hierarchy models (Wijaya, 2012). Paired with the ease of transactions enabled with digital payments, consumers can abruptly terminate their cognitive journey with intentions through factors such as instantaneous excitement or joy. Advertisements focusing on immediacy that aim to make the consumer experience the fear of missing out also play a role in this era of instancy. Evidently, impulse purchases and immediate sales play a more important role today than they did in the past (Harmancioglu, Finney, & Joseph, 2009), as distinctly illustrated by the increasing popularity of social commerce and recently emerging live commerce. Thus, these factors should be considered of greater importance in measuring advertising effectiveness than ever before. While this thesis is not measuring these dynamics, they do underline the importance of companies missing out on marketing communication opportunities with consumers who are actively using ad-blocker software.

1.1.4. Measuring Advertising effectiveness in digital media

Measurability of purchase as the ultimate consumer action has also seen great progress in recent years. Digital advertising spending has overtaken its traditional counterpart, and the processes in which an advertisement is created and in which a consumer is exposed to it have changed greatly (Insider Intelligence, 2022). In digital advertising, not only can the effects of an advertisement that pushes for immediate sales can be measured on the go, but it can also be done with very high precision and detail. Besides, consumer behavior and attitudes can be measured in great detail through social media, which also acts as the main medium for advertisement placement in today's commercial landscape. Factors affecting the performance of an advertisement such as advertising message, creativity, media selection and uniqueness can easily be modified using this vast consumer data before, during and after the launch of a marketing campaign. As the data grew, the tools aiding advertisers in making statistical sense of the data also improved. Being able to focus efforts on immediate sales results while also having the ability to measure them reliably creates a positive reinforcement loop of pushing impulse and short-term sales for a vast majority of brands in the digital world.

1.1.5. Performance Marketing

A relatively new form of marketing that focuses on this phenomenon is performance marketing. Performance marketing, broadly, is digital marketing that is driven by results (Ingo & Schetter, 2018). With performance marketing, advertisers only pay agencies or media outlets if their business objectives are met with specific consumer actions. Pricing in this method is also determined with performance indicators such as cost per click (CPC), cost per impression (CPM), cost per sales (CPS), cost per leads (CPL) or cost per acquisition (CPA). This approach puts overwhelming emphasis on short-term responses from the consumer.

Performance marketing relies on the ease of action taken by the consumer (Ingo & Schetter, 2018). Digital landscape and mainly social media have also evolved in making this possible. Today, consumers can instantly complete a purchase with biometric or facial recognition. If they do not have access to funds, they can

instantly get a loan from their banks. Besides, the emergence of digital products and companies that offer various software as a service (SaaS) also make fulfillment an instant occurrence in many consumer purchases (Dentsu, 2021). Advertising effectiveness in such areas can be measured in real time, completely relying on purchase as consumer action (Morrison & Peterson, 2015). Supported by research that shows existing consumer intent can largely be bypassed in such practices, advertisers no longer feel the need to build long term relationships through advertising. These companies also tend to build marketing strategies that aim to keep the consumer in loyalty loops, building strong relationships to keep retention rates high. However, this can largely be achieved through customer service or product performance but not through advertising (Jebarajakirthy, et al., 2021). In broad marketing strategy, this pushes advertisements into the sole role of closing the purchase, making it even easier to measure advertising effectiveness through sales results (Ingo & Schetter, 2018).

1.1.6. Targeted and personalized advertising

As measurability of individual consumer actions and behaviors in the digital landscape grew, advertisers also started to put higher emphasis on making advertisements tailored to targeted individuals (Johnson, 2013). In the pre-digital era, most targeted advertising was contextual. Contextual targeting simply refers to advertising that is placed or crafted in such a way that it will be more visible or apprehensible by a certain target group (Zhang & Katona, 2012). Sports products being advertised in the sports pages of a newspaper is a typical example of contextual targeting. However, in the digital era, advertisers have an immense capacity to monitor consumers and to identify their behavioral structures to deliver customized advertisements. To this end, passively tracking consumer behavior with digital tools has become adopted widely in the digital landscape (Englehardt, et al., 2015). While most of this tracking is done by code snippets called cookies on browsers, social media platforms also provide immense categorization and identification of consumers today (Englehardt, et al., 2015). There are also lesser-known tracking schemes around the world, such as the ones configured by ISP's

(Internet Service Providers) recording consumer action as they interact with the Internet. While consumers can choose to delete or block browser cookies, participating in ISP tracking is generally not optional and comes with the service (Shiller, Waldfogel, & Ryan, 2018). This means the effective removal of consumer choice from being tracked, categorized, or served customized advertising as a whole. Moreover, it is important to note that the digitization of the world is not limited to digital media. From cable networks to digital outdoor advertising media, many outlets and platforms integrate targeting schemes into their businesses via inclusion of digital tools such as cameras or interactive displays. Thus, targeted advertising plays a much larger role in today's world than it ever did in the past. This, in turn, creates pressure on both advertisers and media to craft schemes of consumer tracking in many ways not clearly visible to, nor controllable by the consumer (Shiller, Waldfogel, & Ryan, 2018).

The extreme end of targeted advertising is regarded as personalized advertising (Tucker, 2014). Targeted advertising, while being highly customized for a target group, eventually relies on segmentation of consumers. As the measurable indicators of consumer behavior grew, topics such as micro-segmentation also started to appear in the literature (Funk, 2002). This approach, however customized it may be, still means that consumers are regarded as a group rather than as individuals. Such advertising, in turn, heavily relies on generalization of messaging and media strategies (Tucker, 2014).

Personalized advertising, on the other hand, considers the immediate interests and actions taken by a single individual regardless of any segmentation (De Kayzer, Dens, & Pelsmacker, 2019). To this end the copy, the message and even the art of a personalized advertisement carry momentary alterability. This alterability takes power from consumer behavior models such as the hybrid consumer model by Ehrnrooth & Gronroos (Ehrnrooth & Gronroos, 2013). According to the hybrid model, consumer behavior is regarded as pseudo-schizophrenic in nature. This means that while a consumer can act like a luxury spender in one category, at a different time of the day, or for a different category, they can heavily act as price

oriented. Thus, consumer segmentation in this model is highly permeable (Ehrnrooth & Gronroos, 2013). Personalized advertising, to this end, does not only consider an individual's behavioral patterns, but the category, time of the day and similar micro indicators into account in creating advertising that is highly focused on short-term effectiveness. From a consumer's point of view, while personalized advertising enables them to be able to view more relevant advertising, the amount of pressure into action they receive also tends to increase due to the nature of immediacy (De Kayzer, Dens, & Pelsmacker, 2019).

1.1.7. Advertising Noise and Attention Seeking Behavior of Advertisements

As media outlets transitioned to the digital, their business model also transformed heavily. Consumers expect to reach information freely and free of charge over the Internet (Chyi, 2005). Thus, many newspapers, TV channels and various forms of traditional outlets started to provide their services with no cost attached. This transformation means that media reliance on advertising as a source of income has increased greatly (Chyi, 2005). Digital advertising, on the other hand, started as an extremely cheaper alternative to traditional advertising at the start of the digital era (Ma & Du, 2018). Eliminating costs for printed material was paired with reduction in costs of production due to digital tools meant lesser costs for all parties involved, compared to traditional advertising (Chyi, 2005). Result oriented pricing models aforementioned also meant that digital media outlets required a much larger percentage of their structure to be reserved for advertisement displays (Chyi, 2005). This, in turn, made it increasingly more cluttered with advertising noise for consumers trying to reach the provided content.

Advertising clutter or noise is described as the existence of a relatively large amount of non-editorial content in an otherwise editorial medium (Ha & McCann, 2008). For the average consumer browsing such an editorial medium, the most prevalent meaning of such clutter is the difficulty in reaching editorial content. For the advertiser, on the other hand, this clutter means heavy competition for the consumer's attention (Rumbo, 2002). Due to such circumstances, advertisers striving for immediate measurable results tend to put a much stronger emphasis on

aforementioned factors such as consumer excitement (Harmancioglu, Finney, & Joseph, 2009). It is concluded that an attention seeking behavior in online advertising became mainstream (Storey, Reisman, Mayer, & Narayanan, 2017). Rather than convincing consumers in a long purchase journey, immediate offers with overwhelming promises of super-benefits started to become the norm. This, in turn, increased precepted fatigue in consumers, often referred to as advertisement fatigue (You, Taeha, & Hoon, 2015). Fatigued consumers tend to show less attention towards advertising in general, while also showing weaker recall of advertisements they are exposed to in research. (You, Taeha, & Hoon, 2015) This general attitude towards advertising meant that advertisers had to undertake even more attention seeking behavior to be able to create effective advertisements (Storey, Reisman, Mayer, & Narayanan, 2017).

Moreover, as advertising became the sole source of revenue for media outlets in the digital era, they too started to seek more and better ways to sell advertising spots to advertisers (Chyi, 2005). Some outlets even take this to the extreme and to ensure consumer action, they tend to view advertising as a store of value in exchange with consumers to reach content. In this method, consumers are asked to view mandatory advertising for an obligatory amount of time to be granted access to specific content (De Kayzer, Dens, & Pelsmacker, 2019). Digital only media, such as YouTube and Twitch consider view of advertising an alternative way of payment for their services. It is argued that this approach effectively underlines a post-digital method of price discrimination, in which viewing advertising is seen as a method of payment. Consumers regard mandatory viewing of advertising, and advertising itself, as undesirable – but sufferable to avoid payment (Edwards, Hairong, & Lee, 2002). As demonstrated in research, in a format of advertising where factors like consumer excitement and joy are of paramount importance, advertising effectiveness suffers an inevitable decline (Harmancioglu, Finney, & Joseph, 2009). The very extreme end of attention seeking advertising could be classified as viral campaigns. Viral campaigns are such advertising practices in which voluntary or involuntary rapid spread of a piece of advertisement is sought to be shared by

consumers over digital media. It is shown that in viral advertising campaigns often use humorous, sexual, shocking, or otherwise appealing content very openly (Fransen, Verlegh, Kirmani, & Smit, 2015).

1.1.8. Disguised Advertising

Rather than planning a forced exposure to advertisements, advertisers may also choose to disguise a piece of advertisement to increase its persuasive power (Fransen, Verlegh, Kirmani, & Smit, 2015). Consumer attention being the lowest it has ever observed, advertisers also look into playing part in creating the content itself – rather than placing advertisements in the content (Fransen, Verlegh, Kirmani, & Smit, 2015). To this end, content marketing and native advertising saw a great increase in numbers after this digital transformation (Johannes, Koch, Viererbl, Denner, & Peter, 2020). Native advertising is a form of advertising where a piece of advertisement is laid out as editorial content. By adopting this strategy advertisers aim to benefit the credibility of publications of journalistic nature. Consumers, on the other hand, may consequently feel deceived at the end of most native advertising (Johannes, Koch, Viererbl, Denner, & Peter, 2020). While their interest, exposure and attention towards the piece that is the advertisement is generally higher than other forms of digital advertising, eventual emotions of being treated dishonestly means a negative tendency towards the advertiser in question. It is argued in the literature that these factors play a large role in generating higher skepticism towards not only the advertisers, but also media outlets in general in today's digital world.

On the other hand, research shows that if native advertising is disclosed at the beginning of the advertisement in question, consumer intent of purchase significantly changes (Johannes, Koch, Viererbl, Denner, & Peter, 2020). This is an important clue in understanding how consumer behavior towards advertisers changes with clarity and openness. However, it is also noted that if the consumer does not realize that the journalistic piece in question is an advertisement, the purchase intent results in the highest percentage possible (Johannes, Koch, Viererbl, Denner, & Peter, 2020). This could be seen as the reasoning behind why advertisers

chose to disclose paid partnerships for native advertisements at the end, as consumers are seen to be less likely to pay attention to such disclosures after they are subjected to the piece of advertisements. It is absolutely necessary to examine consumer behavior with this regard to understand the factors behind the use of ad-blocker software. This thesis attempts to contribute toward this need.

1.1.9. Consumer Privacy & Autonomy

Growing concerns towards consumer privacy is another dimension in hindering advertising effectiveness in the digital era. The term privacy is commonly described as an individual's right to remain in solitude while keeping their secrecy and autonomy (Maseeh, et al., 2021). However, most methods of tracking consumer action over the Internet are not compliant with de-facto consumer right to privacy. A common tendency by media outlets, including social media platforms, is to notify the user at the start of their browsing session that they will be tracked. This methodology means that if the consumer does not agree to being tracked, they will be asked to leave the platform. Current legislation around the world on this topic differs widely on whether media outlets have the right to monitor user action regardless of letting them know that they will do so. In response to evident ethical concerns about such practice, many institutions around the world – including the European Union, developed marketing regulations (Fransen, Verlegh, Kirmani, & Smit, 2015). However, the effects of these regulations are not immediately clear. To this end, consumer data collection and measurement are already being questioned largely by individuals, society, and academic literature (Wu, 2012). The point of difference between opposing views in the matter is whether advertising interactions can be considered commercial consumer action. If this categorical placement can be legally certified, then advertising tracking and measuring becomes just another metric that advertisers can rightfully record such as commercial transactions and post-sales customer service.

Consumer privacy regarding online advertising and advertisement effectiveness research is a largely debated topic in multiple fields of studies. Thus, it is only taken into consideration from a consumer point of view toward advertisers in this study.

Given that one of the main claims of ad-blocker software is protection of privacy, it is necessary to understand the difference between displaying an advertisement and tracking its performance. As the display of advertisement is largely a right of a media outlet, tracking of consumer behavior breaches the boundaries of the outlet in question and can be classified as involuntary information extraction. To this end, while advertising through contextual targeting does promote advertising clutter, it is by no means breaching a consumer's right to privacy. Yet, modern advertising methods such as remarketing completely rely on tracking consumers through different platforms and even devices.

As an addition, advertisers today have to deal with problems of device privacy. Targeted advertising and personalized advertising rely on technology to monitor and display advertisements (Morrison & Peterson, 2015). Thus, traditional media often falls short of fulfilling the bare minimum in which for these methods to succeed. On the contrary, the rise of personal technological devices that are always connected to the Internet create the perfect environment for these advertisements. Consumers spend more time on their mobile and Internet enabled devices today more than ever before (PQ Media, 2020). This means that not only do digital advertising track and act on more consumer data than ever before, but they are also effectively doing this in private devices of consumers with the highest amount of personal intimacy (Chan & Cui, 2002).

This raises the question whether the place in which the advertisement is displayed in an online platform belongs to the consumer or the media outlet. Historically, and to a large extent in current outdoor media, ownership of the media in which the advertisement gets to be displayed bears no question. However, in the digital world, consumers can and do argue that the advertisement gets to be displayed in devices they can claim ownership to. This raises questions about autonomy on the consumer end, while also providing grounds for an individual to claim rights to block such advertising from being displayed completely. While ad-blocker software is seen as the leading method in doing so, many Internet Service Providers (ISP's) provide paid services to consumers to block advertising even before a piece of

advertisement is delivered to their personal devices. This can be done due to the fact that most online advertising is served through specialized networks using tracked consumer data automatically.

Another point in consumer autonomy comes from e-mail marketing. E-mail marketing, while largely regulated in providing consumers a choice in participation, appears to cause a high amount of consumer resistance toward advertising. Consumers who choose to receive e-mail marketing from companies online regularly do not have authority on how often and how loaded an e-mail they will receive from advertisers. Advertisers, on the other hand, do have the capability of tracking consumer action over simple e-mails. Thus, there is an incredible incentive to use e-mail marketing capabilities to the fullest extent on an advertiser's side. This shows that consumers' general reaction toward advertising is not necessarily built on holding participatory choice. Advertisement qualities such as attention seeking behavior, annoyance and frequency also do play a part. To this end, while e-mail marketing certainly is more participatory and transparent compared to digital advertising tracking methods, for the purposes of this study, it is crucial to understand all elements that are driving consumer resistance toward advertising.

1.1.10. Device Performance

Another negative implication of attention seeking advertisement for consumers is the effect on device performance (GlobalWebIndex, 2020). Personal and targeted advertising, and to some extent digital advertising itself, rely on digital methods that detriment device performance indicators such as speed and ease of use. While it is demonstrated that advertising heavy media negatively impacts factors such as battery life and causes other technical issues, consumer experience on advertising heavy media tends to suffer as well (GlobalWebIndex, 2020). According to studies more than one third of the consumers who use ad-blocker software, also claim that doing so speeds up their page loading times significantly (GlobalWebIndex, 2020). Recent academic research by Yan et al. also discusses that consumers who use ad-blocker software tend to leave websites a lot later than those who do not (Yan, Miller, & Skiera, 2022). Following the topic of autonomy, the consumer point of

view is that due to the fact that advertisements certainly degrade device performance, it is totally unacceptable that they have no choice in participating in such an exchange of information (Jebarajakirthy, et al., 2021). This approach transcends advertising tracking as the sole problem in question, and also takes even the presence of advertising in any media platform to begin with.

Advertisers also use mobile notifications for the purposes of reaching consumers as a form of digital advertising. Just like e-mail marketing, mobile notifications can be classified as a type of marketing where participation is voluntary. It is trivial for any given consumer with enough technological savviness to disable notifications or completely delete the advertiser application in question (Gavilan, Fernández-Lores, & Martinez-Navarro, 2020). However, it is shown that consumer attitude toward advertising is greatly affected by nuisance toward advertisements to begin with (Anderson & Gans, 2008). Another positive reinforcement loop is identified in the literature with regards to such voluntary exchanges of information that as ad nuisance goes up, viewers become less averse and finally the amount of advertising necessary to generate a similar outcome increase (Anderson & Gans, 2008). This is why the ad-blocker software phenomenon should be investigated from the points of view of all parties. Even when only some consumer attitude toward advertising, especially in online media, degrades, programming of even traditional media advertising has to be adjusted in a way that increases advertising shown (Anderson & Gans, 2008).

1.1.11. Consumer Resistance toward Advertising

Considering all of the factors leading up to the state in which consumers find themselves today, it is not surprising to find overwhelming evidence of negative perception toward advertising in society. To what extent this negative perception transcends mere annoyance and presents as skepticism and dislike towards advertisers is highly debated. However, research shows that over half of all consumers dislike advertising to some extent (Fransen, Verlegh, Kirmani, & Smit, 2015).

The fact that consumers are increasingly surrounded by advertising, even in traditional media, exacerbates the issue even more. Besides, unlike digital devices, it is much more difficult not to participate in advertising such as outdoor advertising (Johnson, 2013). This study aims to investigate factors such as skepticism towards advertising, resistance towards advertising and conformity to power in order to explain the ad-blocking phenomenon.

Research shows that consumer resistance toward advertising predates the digital era by a large number of years. From simple disbelief to physically avoiding an advertisement, there are many forms of resistance strategies identified in the literature (Speck & Elliott, 1997). Consumers who feel to have negatively impacted by advertising often take action to resist. Commonly referred to as "Consumer Resistance Strategies", these methods vary broadly over a spectrum of physical, mechanical, and cognitive strategies (Fransen, Verlegh, Kirmani, & Smit, 2015). As advertising is designed to persuade consumers, these strategies often render claims effectless through complete avoidance.

The A.C.E. model developed by Fransen et al. (2014) discusses that there are three key strategies consumers use to resist advertising. These strategies are avoidance, contesting and empowering. Avoidance, being fairly well researched, includes physical, mechanical, and cognitive resistances. Speck and Elliott (1997) suggest that avoidance strategies generally aim to ignore communication regardless of the content of the message, while contesting and empowering deal specifically with the advertising message (Speck & Elliott, 1997). While contesting and empowering are key indicators of consumer attitude toward advertising, avoidance as a strategy is generally accepted as the realm in which the phenomenon of ad-blocker software can be classified in. Therefore, in the methodological constructs of this study, avoidance will be further examined.

Identified methods of avoidance in Speck and Elliot's research are physical avoidance, mechanical avoidance, and cognitive avoidance (Speck & Elliott, 1997). There are contradictory conclusions in the literature to where the use of ad-blocker

software falls into within this classification (Fransen, Verlegh, Kirmani, & Smit, 2015). Therefore, it is of utmost importance to identify how these three segments differ from one and other.

In its description, physical avoidance includes a variety of strategies or tactics undertaken by the consumer to completely avoid hearing or seeing a piece of advertisement (Fransen, Verlegh, Kirmani, & Smit, 2015). These strategies, while generally accepted to include ones such as leaving the room or skipping a page of advertisements in a physical newspaper, initially thought to have included the use of ad-blocker software. In research done by Johnson (2013) all of the following are classified as physical avoidance; clicking buttons labeled such as "unsubscribe, do not e-mail, do not track" etc. (Johnson, 2013). With this approach, it can be argued that a consumer clicking a choice indicating button such as "do not display advertisement" or "close advertisement" is classified similar to another consumer who block advertising completely with the help of a computer program that is the ad-blocker software. While similar, there is a great difference between a consumer who chooses to leave an advertisement and a consumer who chooses to not interact with one to begin with.

To this end, other studies categorize the use of ad-blocker software within the realm of mechanical avoidance (Fransen, Verlegh, Kirmani, & Smit, 2015). Mechanical avoidance as described by Cornin and Menelly's study (1992) is the use of choice to avoid advertising without being exposed to it to begin with (Menelly & Cronin, 1992). Zipping (zapping) or simply muting a device such as the television when a commercial break is about to start is given as the main example for this form of avoidance. Cronin and Menelly also identify a key consumer behavior in the subject that is "block zipping". Block zipping refers to the act of skipping multiple advertisements at once disregarding any advertisement qualities such as creativity, advertisement message, length, or properties of the media in which the advertisement take place in (Menelly & Cronin, 1992). It can be argued that the use of ad-blocker software can also be classified as a form of mechanical avoidance,

since consumers do not discriminate between pieces of advertisements when choosing to block them.

The final strategy that is a part of avoidance strategies is cognitive avoidance. Cognitive avoidance of advertisements describes an attitude where viewers chose not to pay attention to advertising while still being exposed to it (Smith, Fabrigar, & Norris, 2008). This method is also referred to as "selective exposure" or "selective attention" in the literature. Selective exposure requires no other tools than a consumer's choice and cognitive ability, thus, it is a phenomenon that has been researched for more than 70 years (Smith, Fabrigar, & Norris, 2008). However, due to this description, ad-blockers cannot be classified as tools enabling selective exposure. Cognitive avoidance in general, however, is extremely important for the general purpose of the study as it is shown in research that consumers who use physical or mechanical avoidance are more inclined to selectively avoid other forms of advertising with forced exposure (Fransen, Verlegh, Kirmani, & Smit, 2015).

In terms of consumer resistance towards advertising, ad-blockers undoubtedly started a new era for advertising since every form of resistance appears to have a counter that could be implemented by the advertiser (Fransen, Verlegh, Kirmani, & Smit, 2015). By totally disabling any form of information exchange even before a possibility of seeing a piece of advertisement, these resistance neutralizing tactics also seem to lose any power whatsoever on the consumer. As advertisers deal with ad-blockers, some forceful strategies in which consumers are required to turn off their ad-blocker software start to appear (Dinger, 2016). To comprehend the outcomes of such strategies, it is important to understand what advertisers have employed in the past to overcome classical advertising resistance strategies consumers have shown in the past.

1.1.12. Resistance Neutralizing Tactics

Advertisers historically responded to consumer resistance strategies, actively. These responses are classified as 'Resistance-neutralizing persuasion strategies to overcome consumer resistance (Fransen, Verlegh, Kirmani, & Smit, 2015). The

overarching phenomenon is often described as an “arms race” between consumers and advertisers and has been thoroughly researched from various points of view over the past few decades on conventional media -Newspapers, Magazines, Radio, Television, Cinemas and more- (Storey, Reisman, Mayer, & Narayanan, 2017). These tactics more often than not focus on making the advertisement itself more attractive. Use of humor, celebrities, endorsements by important individuals or music can be given as common examples for this effort (Knowles & Linn, 2004). Knowles and Linn call these traditional methods “alpha strategies” that focus on increasing a piece of advertisement’s approach toward the consumer. However, they also refer to a separate group of strategies as “omega strategies” that focus instead on reducing present resistance of consumers toward the advertisements. Therefore, it is established in research that making advertisements more attractive is a separate phenomenon than neutralizing resistances of a given consumer.

While there are a multitude of strategies to reduce the resistance of consumers, or in other words “omega strategies” for each type of resistance, for the purpose of this study, those that are applicable to avoidance will be taken into deeper consideration. Fransen et al. discuss that physical avoidance type strategies to be the most difficult of all (Fransen, Verlegh, Kirmani, & Smit, 2015). This is explained as simply due to the tendency of a consumer to cut off the possibility of communication very early on. However, one strategy that seems to be employed by many anti-ad-blocking online media is forced exposure (Dinger, 2016).

Forced exposure spans across a variety of methods in making sure that a piece of advertisement is exposed to a consumer (Fransen, Verlegh, Kirmani, & Smit, 2015). Hegner, Kusse and Pruyn (2014) discuss that while consumers find forcefully exposed ads more intrusive, using correct attractive elements can alleviate negative perception to some extent (Hegner, Kusse, & Pruyn). Some other examples of forced exposure can be employed by multiple broadcasters or media outlets acting together. One example in this category is television stations performing synchronized advertising breaks in prime-time television (Fransen, Verlegh, Kirmani, & Smit, 2015). While not being immediately relevant in the case of ad-

blocker software, this shows that advertisers and media can have an open tendency to eliminate consumer resistance towards advertising through collaboration.

Finally, although there are a number of studies that demonstrate negative effects of forced exposure on consumer attitude, such as the study done by Edwards et al (2002) there are others that evidently suggest “any” exposure is better than none (Edwards, Hairong, & Lee, 2002). In a world where consumers are overwhelmingly surrounded by commercial messages, there rises the need to do further research on whether forced exposure leads to higher consumer resistance as well. In line with the purpose of this study, advertising avoidance, attitude toward advertising and attitude towards ad-blockers are also investigated.

1.1.13. Rise of the Ad-Blocker Software

The term ad-blocker software typically refers to computer programs that are installed on desktop devices in order to block all forms of advertising from ever being displayed (Yan, Miller, & Skiera, 2022). However, it can be argued that these pieces of software are indeed a continuation of advertising bypass technologies from the start of the century. Commonly referred to as AATs (Advertisement Avoidance Technology) such as Digital Video Recorders (DVR), this collection of methods and devices helped consumers to unbundle commercial messaging from various forms of video content (Anderson & Gans, 2008). It was argued in the literature at the time that if AATs became mainstream, advertisers would lose the ability to reach consumers through commercial television, therefore virtually rendering free-to-air television obsolete as a business model (Anderson & Gans, 2008). Regardless of the underlying reasons for consumers to choose to use such technology, advertisers in turn would project to increase the amount of advertising they ran in order to maintain similar outcomes in measured business metrics such as sales results.

However, while the similarities are evident, unlike the technology of DVRs, ad-blocker software only exists for one specific purpose. It can be argued that the main consumer benefit for a digital video recorder is to be able to watch televised content

later at their own leisure (Anderson & Gans, 2008). While doing so, having an ability to unbundle commercial messaging acts as a secondary function – regardless of its benefit toward consumer enjoyment. Dislike towards advertising when considering ad-blocker software is more evident on the side of the consumer since the main benefit of such a program is to completely remove advertising from ever being displayed accompanying any content (Miroglio, Zeber, Kaye, & Weiss, 2018). Yet, an argument could be made that due to the nature of the Internet, any content is enjoyable at a consumer's own leisure, without the need for digital video recorders, therefore removing the need for such a device's original purpose.

Consumer adoption of ad-blocker software, however, is widely researched. A study done by the research company GlobalWebIndex show that highest motivations behind wanting to block advertisements to begin with are the number of advertisements, annoyance of advertisements and the intrusive nature of digital advertising (GlobalWebIndex, 2020). While measurements such as the annoyance or the number of advertisements could be translated into commercial television, intrusive nature of advertisements only make appropriate sense in a digital environment. Therefore, it is evident that the global rise in the use of ad-blocker software cannot be solely traced back to historical consumer behavior.

The number of consumers using ad-blocker software is not negligible. It is estimated that over 50% of all internet users around the world use a form of ad-blocker software (GlobalWebIndex, 2020). Research also shows that consumers who use ad-blocker software also interact with media in completely different ways. According to a study done by Yan et al. users of ad-blocker software consume 21% to 43.2% more of an online newspaper compared to those who do not use ad-blocker software. Interpretations of this result can be done in a multitude of ways; however, it is clear that online advertising reduces consumers' willingness to spend time on websites due to lessened enjoyment (Yan, Miller, & Skiera, 2022).

1.1.14. Counter Ad-Blocking

This defensive response to marketing communication has been extensively studied in the literature. Friestad and Wright (1994) developed the persuasion knowledge model, describing how consumers respond to persuasive attempts (Friestad & Wright, 1994). Becoming one of the key theories in research, the model is applied to understand how consumers respond defensively to advertising on various media – digital and conventional alike (Panic, 2013).

As discussed earlier, most counter ad-blocking happens through essentially modern forced exposure methods. However, for the purposes of this study the field of counter ad-blocking is highly technical and technological in nature. Studies done by Rafique et al. and Zhao et al. discuss this topic further in terms of software development in detail (Rafique, Goethem, Joosen, Huygens, & Nikiforakis, 2016) (Zhao, et al., 2017). However, the same study done by Rafique et al. discovered that more than 16.3% of the websites they crawled employed some sort of counter ad-blocking mechanism (Rafique, Goethem, Joosen, Huygens, & Nikiforakis, 2016). As technology develops, there is suggested to be even more methods of counter ad-blocking available to online publishers, such through browser technologies or through advancements in front-end development languages – such as JavaScript (JS) (Nithyanand, et al., 2016). While technically out of scope for this study, it is important to note that as consumers continue to resist advertising with an increasing number of technological tools, advertisers also try to break such programs through forceful methods.

1.2. Ad-Blocker Software in the Academic Literature

Ad-blocker software, also referred to as ad-blocking technology, has been the subject of considerable interest within academic literature in recent years. The primary function of ad-blocker software is to prevent the display of advertisements on a user's web browser, thereby providing a more streamlined browsing experience and protecting the user's privacy (Johannes, Koch, Viererbl, Denner, & Peter, 2020).

Ad-blockers work by blocking the code that renders advertisements on a website, thereby effectively hiding them from the user (Singh & Potdar, 2009).

One area of research within academic literature has been the impact of ad-blocker software on the online advertising industry. A plethora of studies have highlighted the significant financial losses incurred by online publishers as a result of ad-blocking technology. This is due to the fact that the majority of online publishers rely heavily on advertising revenue to sustain their operations and produce high-quality content. However, the use of ad-blockers has resulted in a decline in the number of impressions and click-through rates, leading to a loss of revenue for these publishers (IAB UK, 2015).

Another area of research has been the impact of ad-blocker software on the user experience. A number of studies have indicated that users who employ ad-blocking technology report higher levels of satisfaction with their browsing experience, as they are no longer being interrupted by unwanted advertisements. However, it is also important to note that the use of ad-blockers can lead to an adverse impact on the user experience, as it can cause a delay in the loading time of websites (Englehardt, et al., 2015).

In contrast to the negative effects of ad-blocker software on the online advertising industry and user experience, some researchers have also highlighted potential positive effects. For instance, ad-blockers have been found to reduce the spread of malware and protect users from online scams (Tucker, 2014). Additionally, by blocking unwanted ads, ad-blockers can help to reduce the amount of data sent to users, thereby improving the performance of mobile devices (Tucker, 2014).

In summary, ad-blocker software has been the subject of extensive research within academic literature in recent years. While it is acknowledged that the use of ad-blockers can result in significant financial losses for online publishers and a negative impact on the user experience, it is also important to note that ad-blockers can have positive effects such as reducing the spread of malware and data usage. Therefore, it is crucial for researchers to continue to explore the impact of ad-

blocker software in order to fully understand the implications of its use in the current digital landscape.

1.2.1. Technical Aspects of Ad-Blocker Software

The technical implementation of ad-blockers is accomplished through a variety of methods, which include the use of filter lists, browser extensions, and browser settings.

One of the most widely used methods employed by ad-blockers is the use of filter lists. These lists contain a compilation of rules that specify which elements of a webpage should be blocked. The rules in the filter lists are typically based on the URL of the advertisement or the HTML elements that are used to display it. Ad-blocker software uses these filter lists to automatically block the specified elements on a webpage, thereby preventing the display of advertisements (Zhao, et al., 2017).

Another popular method for implementing ad-blocking technology is through the use of browser extensions. These extensions are typically developed by third-party developers and are made available for popular web browsers such as Chrome, Firefox, and Safari. These extensions work by intercepting network requests made by the browser and blocking those that are deemed to be ads (Adobe, 2015).

Additionally, some web browsers include built-in ad-blocking functionality. This can be achieved through the use of browser settings which allow users to configure the browser to block certain types of content, such as ads, pop-ups, and trackers. This method is less flexible than using browser extensions as it does not allow for the use of filter lists and is limited by the options provided by the browser.

As a result, ad-blocker software is implemented through a variety of technical methods, including the use of filter lists, browser extensions, and browser settings. The use of filter lists is the most widely used method as it allows for a high degree of flexibility in specifying which elements of a webpage should be blocked (Nithyanand, et al., 2016). Browser extensions and browser settings are also popular methods, but they have some limitations. As technology and the digital landscape

continue to evolve, it is crucial for researchers to keep track of the advancements of ad-blocker software and its technical implementation to fully understand its impact on the online advertising industry and user experience.

1.2.2. Ad-Blockers and the Consumer Response

Research on the field commonly focuses on a specific set of ad-blocker software. One of these software is called “Adblock Plus”, is claimed to be the most popular ad-blocking tool on the internet. With an 85% share of the ad-blocking tool market according to research (Willis & Uzunoglu, 2016), Adblock Plus appears in the literature in several studies regarding its technical aspects.

Other studies, such as the ones done by Nithyanand et al. (2016) have focused on the technical aspect of ad-blocking and counter-ad-blocking mechanisms, however, this study focuses on understanding the factors that influence ad-blocker usage and the behavior of users (Nithyanand, et al., 2016).

According to another research (Singh & Potdar, 2009) it is possible to identify seven main reasons for internet users to block online ads, such as preventing malware infection, psychological impacts, and misleading users, but our research examines objective factors such as user demographics and environmental factors, such as operating systems and traffic sources, which are more easily acquired by publishers and advertisers (GlobalWebIndex, 2020).

1.2.3. Effects of Ad-Blocker Software on the Advertising Industry

Ad-blocker software has been a growing concern for the advertising industry in recent years. One of the main effects of ad-blockers on the advertising industry is the loss of revenue (GlobalWebIndex, 2020). Ad-blockers prevent advertisements from being displayed to users, which means that advertisers are not able to reach their intended audience. This can result in a significant loss of revenue for advertisers, as well as for the publishers and website owners who rely on advertising revenue. Extensive research can be found in the literature focusing on the damage done to advertisers and media outlets through the widespread use of ad-blockers software (GlobalWebIndex, 2020).

Another effect of ad-blockers on the advertising industry is the increased use of ad-blocking-resistant formats (Johannes, Koch, Viererbl, Denner, & Peter, 2020). As ad-blockers have become more prevalent, advertisers have been forced to find new ways to reach their audience. One of the ways they have done this is by using ad-blocking-resistant formats, such as native advertising, which blends in with the content of a website and is less likely to be blocked by ad-blockers. However, the use of these formats raises ethical concerns about transparency and user deception.

Ad-blockers also have an effect on the user experience. With ad-blockers, users are able to browse the internet without being bombarded by ads, which can lead to a more pleasant browsing experience. However, this can also lead to a decline in the quality of content on the internet, as publishers and website owners may struggle to generate revenue without advertising. This can lead to a decline in the quality of content, which can negatively impact the user experience (Singh & Potdar, 2009).

Ad-blockers also have a significant effect on the relationship between advertisers, publishers, and users. Ad-blockers can change the dynamics of the advertising ecosystem, with users having more control over what they see and publishers and advertisers having to adapt their strategies to reach their audiences. This can lead to new business models and opportunities, but also to challenges and conflicts (GlobalWebIndex, 2020).

In summary, ad-blocker software has had a significant impact on the advertising industry, resulting in a loss of revenue for advertisers, an increased use of ad-blocking-resistant formats, and an effect on the user experience. Ad-blockers also have an effect on the relationship between advertisers, publishers, and users, changing the dynamics of the advertising ecosystem. While ad-blockers present challenges for the advertising industry, they also provide opportunities for innovation and new business models.

It's worth noting that the use of ad-blockers also has a significant effect on the publishers and website owners, who heavily rely on the advertising revenue to keep

their content free. Hence, it's important to find a balance between providing good user experience and supporting the creators and publishers.

1.2.4. Counter Ad-Blocking Methods

As a result of the growing concern for ad-blocker software in the advertising industry, advertisers have had to find ways to counter the use of ad-blockers in order to reach their intended audience and maintain their revenue streams (Miroglio, Zeber, Kaye, & Weiss, 2018). This section of the literature review will examine the ways in which advertisers have been trying to stop consumers from using ad-blocker software by analyzing studies, research, and articles on the topic.

One of the ways advertisers have been trying to stop consumers from using ad-blockers is by using ad-blocking-resistant formats (Gavilan, Fernández-Lores, & Martinez-Navarro, 2020). Advertisers have been using native advertising, which blends in with the content of a website and is less likely to be blocked by ad-blockers. This format is often seen as more user-friendly, as it does not disrupt the user's browsing experience. Another format that advertisers have been using is in-feed advertising, which is harder to detect and block by ad-blockers.

Another way advertisers have been trying to stop consumers from using ad-blockers is by using anti-ad-blocking scripts (Johannes, Koch, Viererbl, Denner, & Peter, 2020). These scripts detect the presence of ad-blockers and prevent the ad-blocker from working, or they may ask users to disable their ad-blocker in order to view the content.

Advertisers have also been using education and communication as a way to stop consumers from using ad-blockers. They have been communicating to users about the negative impact of ad-blockers on the content creators and website owners, who rely on the advertising revenue to keep their content free. Advertisers have also been educating users about the potential security risks associated with ad-blockers.

Advertisers have also been using alternative revenue models, such as subscription-based models and paywalls, to stop consumers from using ad-blockers. These

alternative revenue models allow website owners and content creators to generate revenue without relying on advertising.

As a result, advertisers have been using various strategies to stop consumers from using ad-blocker software. These include using ad-blocking-resistant formats, anti-ad-blocking scripts, education and communication, and alternative revenue models. However, it's important to note that the use of ad-blockers can also be seen as an opportunity for advertisers to improve the user experience, by creating more user-friendly ads, and to find new business models that are more sustainable in the long run.

1.3. Highlighted Gap in the Literature

A gap in the literature on ad-blocker software is evident in the literature review conducted for this thesis. While there are many specialized studies done on the use of ad-blocker software, such as technical or behavioral, research on ad-blocker software is most often done with digital advertising and consumers' attitude toward digital advertising alone.

This study proposes that consumers' attitudes toward advertising are similar, whether the subject is digital or conventional advertising. Moreover, consumer behavior is affected by both digital and conventional advertising today, as both forms of advertising are prevalent enough to be viewed by any given consumer in a common setting.

The following sections will expand upon this gap.

1.3.1. Consumer Behavior & Ad-Blocker Software

As noted earlier in this study, the academic literature on ad-blocker software is mostly on the technical aspects of the software itself. However, there are a number of relatively recent studies that employ a perspective that incorporates consumer behavior into the equation.

Consumer behavior towards ad-blocking software has been the subject of much research in recent years. This section will examine research on consumer behavior and ad-blocking software by analyzing studies, research, and articles on the topic.

One of the main factors that influence consumer behavior towards ad-blocking software is the perceived level of ad annoyance (Dinger, 2016). Many studies have found that consumers who are exposed to a high level of ad annoyance are more likely to use ad-blocking software. Ad annoyance can be defined as the disruption of the user's browsing experience caused by ads. This can include things like ads that take up too much space on the page, ads that automatically play sound, or ads that are not relevant to the user.

Another factor that influences consumer behavior towards ad-blocking software is privacy concerns. Consumers are becoming increasingly concerned about their online privacy, and many are using ad-blocking software to protect their personal information from being collected by advertisers. A study by the Interactive Advertising Bureau (IAB) found that 63% of ad-blocker users cite privacy concerns as the main reason for using ad-blockers (IAB UK, 2015).

The perceived level of control over the advertising experience also plays a role in consumer behavior towards ad-blocking software. Consumers want to be able to control the ads they see and when they see them. Ad-blocking software gives consumers the ability to control the ads they see, and this can be a key motivator for using ad-blockers. A study by the IAB found that 54% of ad-blocker users cite the ability to control the ads they see as the main reason for using ad-blockers (IAB UK, 2015).

The literature also suggests that demographics play a role in consumer behavior towards ad-blocking software. Young people are more likely to use ad-blockers than older people. The same study by the IAB found that 71% of ad-blocker users are between the ages of 18 and 34 (IAB UK, 2015).

In conclusion, research has shown that consumer behavior towards ad-blocking software is influenced by a variety of factors, including the perceived level of ad annoyance, privacy concerns, the perceived level of control over the advertising experience, and demographics. Advertisers and publishers need to take note of these factors and try to reduce the ad-nuisance and annoyance that their ads may cause, in order to avoid losing the attention of their audience. Therefore, this study aims to underline the necessity of exploring consumer behavior in tackling ad-blocker software use by advertisers.

1.3.2. Integrated Review of Ad-Avoidance and Ad-Blocker Software

This study aims to further the multi-disciplinary approach and focus on the consumer behavior side of the issue at hand via analyzing consumer response to both digital and conventional advertising. There is a gap in academic literature that takes both digital and conventional ad nuisance into consideration when it comes to analyzing ad-blocker software.

Therefore, one of the aims of this thesis is to contribute to the existing literature by examining consumer behavior towards ad-blocking software from a multi-disciplinary perspective. Specifically, the study focuses on analyzing consumer response to both digital and conventional advertising. This approach is important as it allows for a more comprehensive understanding of the issue at hand, as the impact of ad-blocking software is not limited to digital advertising alone.

In terms of ad nuisance, both conventional and digital advertising share similarities. Conventional advertising, such as television and radio ads, can also be a source of annoyance for consumers (Edwards, Hairong, & Lee, 2002). For example, a commercial break during a favorite show can disrupt the viewing experience and cause frustration. Similarly, digital advertising, such as online banner ads or pop-ups, can also be disruptive to the user's browsing experience (Fransen, Verlegh, Kirmani, & Smit, 2015). Both forms of advertising can be perceived as intrusive and can lead to a negative consumer attitude towards the ads and the brands they represent.

Moreover, the study aims to provide a better understanding of how consumer behavior towards ad-blocking software may be influenced by ad nuisance in both digital and conventional advertising. By examining consumer response to both types of advertising, the study aims to identify common factors that drive consumer adoption of ad-blockers and to suggest ways in which advertisers and publishers can reduce ad-nuisance and improve the advertising experience for consumers.

In conclusion, this study aims to contribute to the existing literature by examining consumer behavior towards ad-blocking software from a multi-disciplinary perspective, specifically by analyzing consumer response to both digital and conventional advertising. Through this approach, the study aims to provide a more comprehensive understanding of the issue at hand, and to identify common factors that drive consumer adoption of ad-blockers in both digital and conventional advertising in terms of ad-nuisance.

1.3.3. Skepticism toward Advertising

Advertising skepticism refers to the belief that advertising is untruthful, manipulative, or otherwise problematic (Armstrong & al., 2014). Skepticism towards advertising can have a significant impact on consumer behavior, and it is an important area of research in the field of advertising and consumer behavior. This literature review will examine the research on skepticism towards advertising in both conventional and digital advertising and will identify similarities in consumer attitudes towards advertising in both areas.

Research has shown that skepticism towards advertising is prevalent among consumers in both conventional and digital advertising. A study by Boush et al. found that consumers have a generally negative attitude towards advertising in conventional media, such as television and radio (Boush, Friestad, & Rose, 1994). They found that consumers view advertising as intrusive, irrelevant, and untrustworthy. Similarly, a study by LaRose et al. (2002) found that consumers have a negative attitude towards online advertising, viewing it as intrusive, irrelevant, and untrustworthy (LaRose & Easin, 2002).

Additionally, research has shown that consumers have similar reasons for their skepticism towards advertising in both conventional and digital advertising. A study by Boush et al. (1994) found that consumers are skeptical of advertising in conventional media because they believe that ads are manipulative and untruthful. Similarly, a study by LaRose et al. (2002) found that consumers are skeptical of online advertising for the same reasons, believing that ads are manipulative and untruthful.

Furthermore, research has also shown that consumers have similar behaviors in response to their skepticism towards advertising in both conventional and digital advertising. The study by Boush et al. (1994) also found that consumers tend to ignore or avoid advertising in conventional media.

While there is a rich literature on skepticism toward advertising, the topic is rarely discussed in terms of ad-blocker software or digital advertising. This study aims to find out if this ever-growing advertising skepticism can be a defining factor in why consumers use ad-blocker software.

1.4. Structure of the Study

This study aims to expand upon the highlighted gap in literature via a unified approach toward advertising annoyance, nuisance, and avoidance to understand the underlying factors that may be associated with the usage of ad-blocker software. Several constructs from a variety of disciplines will be adapted into a unified model that tries to predict users' likelihood of using ad-blocker software. The following section will describe these constructs and the latter part of the study will focus on the quantitative research conducted to test the proposed model.

2. RESEARCH CONSTRUCTS

Inline with the goal of this study, several constructs were borrowed from other academic research. These constructs, then, were structured in a way that attempts to combine a complete model in predicting any given consumer's likelihood of using ad-blocker software.

This section will highlight these constructs and provide the necessary background information on how they were employed and adjusted for the use of this thesis. Each construct will also be accompanied by the relevant hypothesis of the thesis. These hypotheses will then be introduced along with the proposed model that aims to fulfill the aforementioned research goals.

2.1. Expanding Advertising Skepticism with regards to Digital Advertising

Existing research on consumer skepticism toward advertising is extensive. Obermiller & Spangenberg define this skepticism as the tendency toward disbelief of advertising claims. A free, healthy, and thriving marketplace relies very much on easily accessible information by consumers (Obermiller & Spangenberg, On the origin and distinctness of skepticism toward advertising, 2000). To the extent of this information, consumers must not only be able to access it, but they must also be convinced that the information is reliable.

Regardless of the type of media consumers find advertising messages to be misleading. Skepticism in this manner is observed to be generalized across media within individuals. This attitude also transcends the literal truth of advertising claims. Comparative analysis shows that skepticism towards advertising is distinctive compared to skepticism towards other sources of product information. Thus, the intentions of the advertisers, the value of the information or how appropriate specific advertising claims are for their intended target audiences also play a role in the measure of skepticism. Skepticism towards advertising is a persistent issue throughout modern history. Studies done by Calfee and Ringold observed that the proportion of consumers who could be classified as skeptics remained consistent at around 70% over various measurements and over 60 years of data (Obermiller & Spangenberg , Development of a Scale to Measure Consumer Skepticism Toward Advertising, 1998). This inherent distrust means that it is not possible to understand the real effects of advertising, unless consumers have specific reasons to trust the claims put forth by advertisers (Calfee & Ringold, 1994). The inherent nature of disbelief toward advertising also points to the issue

being not limited to conventional media. Furthermore, there is compelling evidence that the initial consumer socialization occurs in the family (Ward, 1978). Thus, it could also be argued that skepticism can transcend generations.

H_1: Skepticism toward advertising has an effect on use of ad-blocker software.

The 9-item scale SKEP developed by Obermiller & Spangenberg measuring consumer disbelief towards advertising claims takes this into consideration and will be used in this study. The items of the scale can be seen in Figure 1.

Figure 1 Skepticism Toward Advertising Scale

Ad Skepticism Scale by Obermiller & Spangenberg (Obermiller & Spangenberg , Development of a Scale to Measure Consumer Skepticism Toward Advertising, 1998)
1. We can depend on getting the truth in most advertising
2. Advertising's aim is to inform the consumer
3. I believe advertising is informative
4. Advertising is generally truthful
5. Advertising is a reliable source of information about the quality and performance of products
6. Advertising is truth well told
7. In general, advertising presents a true picture of the product being advertised
8. I feel I've been accurately informed after viewing most advertisements
9. Most advertising provides consumers with essential information

2.2. Attitude Toward Advertising

It is extremely important to gauge consumers' attitude toward advertising to understand the mechanical or behavioral nature overall of ad-blocker use. Almost all users of ad-blocking software classify their motivations within some form of opinion toward online advertising (GlobalWebIndex, 2020). As since for the first time in history, digital advertising spending overtook traditional advertising spending in 2019, attitudes toward advertising in general explain and are affected by online advertising to a larger degree (Insider Intelligence, 2022). Therefore, for the purpose of this study, a general construct to identify advertising as a whole is necessary – rather than one that is limited to digital advertising.

H_2: Attitude toward advertising has an effect on use of ad-blocker software.

To this end work done by Rojas-Mendez et al. will be taken as a basis for this study's attitude toward advertising construct design (Rojas-Méndez, 2009). According to this study, beliefs about advertising can be conceptualized using two factors: advertising as a positive economic effect and advertising as a vehicle to promote consumption (Rojas-Méndez, 2009). A scale of 9-items is used to identify consumers' attitude toward advertising. The measurement items are as shown in **Figure 2 Attitude Toward Advertising Scale** (Rojas-Méndez JI, 2005)**.**

Figure 2 Attitude Toward Advertising Scale **(Rojas-Méndez JI, 2005)**

Attitude Toward Advertising Scale by J.I. Rojas-Méndez et al.
1. Overall, I consider advertising a good thing
2. I like advertising
3. Advertising is making us a materialistic society
4. Advertising makes people live in a world of fantasy

5. Advertising makes people buy unaffordable products just to show off
6. Because of advertising people buy a lot of things they do not really need
7. Advertising tells me what people with lifestyles similar to mine are buying and using
8. Advertising helps raise our standard of living
9. Advertising results in better products for the public

2.3. Attitude Toward Authority

As per the literature review done for this study, measurement of cultural orientations toward authority were also considered as a possible construct that could explain the use of ad-blocker software by the consumers. Due to the limitations of the study, only Turkish consumers have been invited as participants. However, previous research done by Bush et al. indicate that there may be overarching cultural reasons to whether consumers conform or reject authoritative instructions exerted on them (Bush, Smith, & Martin, 1999).

However, choosing to use ad-blocker software is inherently a personal decision that is done on relatively private technological devices (Dinger, 2016). Thus, it is important to measure consumer attitude toward authority with individual attitudes in mind. Based on Hofstede's (1980) cultural dimensions, a wide variety of academic research has been done focusing on individual consumer's cultural orientations (Sharma, 2010). To this end, a construct was created using previous work by Sharma (2010) in order to measure individual attitude toward authority. The 5-item scale was localized, and the measurement items are used as seen in **Figure 3 Consumers' Conformity to Power Scale** (Sharma, 2010)**.**

Figure 3 Consumers' Conformity to Power Scale **(Sharma, 2010)**

Individual Consumers' Cultural Orientations by Sharma
Power (POW)
1. I easily conform to the wishes of someone in a higher position than mine
2. It is difficult for me to refuse a request if someone senior asks me
3. I tend to follow orders without asking any questions
4. I find it hard to disagree with authority figures
5. People in higher positions have more power than those who are in lower positions

2.4. Attitude Toward Ad-Blockers

Use of ad-blocker software is inherently limited to a consumer's technological savviness (Miroglio, Zeber, Kaye, & Weiss, 2018). Thus, consumer intentions and attitude toward ad-blocker software may not directly translate into their eventual use of ad-blocker software. To overcome this issue, a separate construct that is the "attitude toward ad-blockers" was developed and used for this study. Attitude toward ad-blockers is measured with an 8-item scale that was specifically constructed for the purposes of this paper. Necessary analysis to test the reliability and relevance of this scale is conducted to ensure validity. The measurement items are as shown in **Figure 4 Attitude Toward the Use of Ad-Blocker Software.**

Figure 4 Attitude Toward the Use of Ad-Blocker Software

Attitude toward the use of Ad-Blockers
1. I suggest others to use ad-blocker software

2. As a consumer, I have the right to use ad-blocker software
3. Ad-blocker software makes my life easier
4. I sometimes lose access to important information due to my use of ad-blocker software
Attitude toward Ad-Blocker Software
5. Ad-blocker software are beneficial to the consumer and the public
6. Ad-blocker software damages brands financially
7. Ad-blocker software damages media outlets
8. Ad-blocker software makes life easier for consumers

2.5. Advertising Avoidance

To measure advertising avoidance, three types of physical and four types of mechanical avoidance were included from the work of Danaher (1995) and Rojas-Mendez and Davies (2005).

It is important to note that one type of consumer avoidance is named differently in Rojas-Mendez et al. (2009) study than the work of Fransen et al. (2015). However, their classification and structure are identical. While Rojas-Mendez et al. (2009) calls actions such as leaving the room during an advertisement as behavioral avoidance, Fransen et al. dubs them as physical avoidance. However, both Rojas-Mendez et al. (2009) and Fransen et al. (2015) call actions such as muting the sound of a television as mechanical avoidance. For the sake of clarity, this study will use physical avoidance rather than behavioral avoidance. The measurement items are as shown in **Figure 5 Advertising Avoidance Scale.**

Figure 5 Advertising Avoidance Scale **(Rojas-Méndez JI, 2005)**

Conventional Media Advertising Avoidance Framework by Rojas-Méndez JI, Davies G.
Behavioral (Physical) Avoidance – When Encountering Advertising
1. Leave the room
2. Read a book, magazine, newspaper etc.
3. Talk with other people in the room
4. Make phone calls
Mechanical Avoidance – When Encountering Advertising
1. Switch to another channel (zapping)
2. Switch the television set off
3. Mute the sound

3. RESEARCH MODEL AND HYPOTHESES

Building upon the theoretical framework presented in Section 3, this study examines the relationship between consumers' skepticism toward advertising, attitude toward authority, advertising avoidance and consumers' attitude toward ad-blockers, conformity to power and consumers' use of ad-blocker software.

Specifically, five hypotheses are tested in this study as follows:

Table 1 Research Hypotheses.

H_1: Skepticism toward advertising has an effect on use of ad-blocker software.

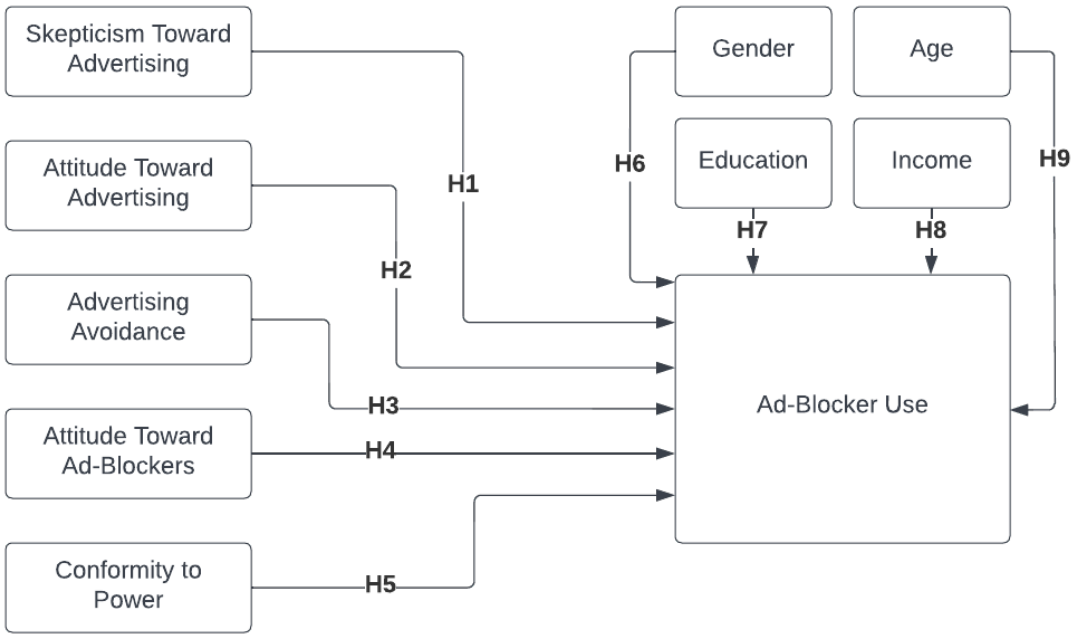
H_2: Attitude toward advertising has an effect on use of ad-blocker software.
H_3: Advertising avoidance has an effect on use of ad-blocker software.
H_4: Attitude toward ad-blockers has an effect on use of ad-blocker software.
H_5: Conformity to power has an effect on use of ad-blocker software.

In addition to the main five hypotheses, this study tests four hypotheses about the relation between basic consumer demographics and use of ad-blocker software as follows.

H_6: Gender has an effect on use of ad-blocker software.
H_7: Education has an effect on use of ad-blocker software.
H_8: Income has an effect on use of ad-blocker software.
H_9: Age has an effect on use of ad-blocker software.

The initial model for the study is shown in **Figure 6 Research Model.**

Figure 6 Research Model



4. METHODOLOGY

4.1. Research Objective

The main objective of this thesis is to advance literature on the use of ad-blockers with regards to consumer attitudes, mainly skepticism, toward advertising. To do this, the research focused on consumers' motivations to use ad-blocker software and explored if any of the proposed constructs can predict the likelihood of a consumer's use of ad-blocker software.

The hypotheses were tested with an online survey done in Turkey. To be able to determine if demographics play a definitive role in affecting consumers' use of ad-blockers, no limitations were set in selecting participants.

4.2. Sample Selection and Data Collection

4.2.1. Sample Selection

The sampling for this study is based on basic technological literacy. The aim was to reach out to participants who are actively using the Internet on their own personal devices without any aid from other individuals. There were no restrictions set for any descriptive demographics.

An online survey has been distributed across multiple demographics with a variety of professions without any gender orientation. Participation was voluntary and anonymity was ensured. The questionnaire held multiple choice questions and Likert-type scales adjusted and localized from previous research. The questionnaire language was Turkish, therefore only Turkish speakers participated in the study. There were no restrictions based on geography.

Detailed information of the descriptive demographics of the participants will be presented later on in the thesis.

4.2.2. Data Collection

An online survey was created on SurveyMonkey and distributed between 13th of March 2021 and 12th of May 2021. Within the four-week period of research 214 participants responded with a complete form. After sorting and removing duplicates, a net sample of 200 usable questionnaire responses were selected for the study.

4.2.3. Construct Measurement and Questionnaire Design

The construct measurements used in this study are aforementioned in their respective sections. To follow up on these and realize the study, a questionnaire was designed and conducted.

The questionnaire was structured in multiple sections. Each section was designed to measure a single construct. The first section of the questionnaire was based on skepticism toward advertising (Obermiller & Spangenberg , Development of a

Scale to Measure Consumer Skepticism Toward Advertising, 1998). Skepticism was measured with 9 items.

The second section of the questionnaire was aimed to measure overall attitude toward advertising. The third section was aimed to measure mechanical and behavioral avoidance of advertising. These sections were adapted from previous research on how consumer attitude toward advertising affected advertising avoidance (Rojas-Méndez, 2009).

The fourth section was aimed at consumer attitude toward ad-blocker software. An 8-item scale was developed and presented to the participants. This goal with this section was to uncover if participant attitude toward ad-blocker software directly translates into ad-blocker software use. Use of ad-blocker software requires considerable technological savviness, thus any discovery in this part should be further discussed in a future study.

The last section of the questionnaire was aimed at measuring consumer attitude toward authority and their conformity to power. The 5-item scale was adapted from the work of Sharma on measuring personal cultural orientations (Sharma, 2010).

The dependent variable was designed as consumer ad-blocker software usage. The dependent variable was partitioned in two; ad-blocker software usage on mobile devices and ad-blocker software usage on desktop devices. Research indicates that consumers use ad-blocker software significantly more frequently on desktop devices when compared to mobile devices. The main reason for this occurrence is that the amount of technological knowledge required to install and run an ad-blocker software on a fundamentally different and limited operating system such that can be found on mobile devices is considerably higher. Besides, many mobile devices simply do not provide enough user freedom to install and run such additional software. Thus, it was necessary to see this difference to be able to conclude an underlying technological knowledge limitation for future studies.

The dependent variable was constructed with three outcomes for each mobile and desktop counterpart. These outcomes were aimed at identifying consumers who have never used ad-blocker software, who have used ad-blocker software in the past but no longer do and finally those consumers who are actively using ad-blocker software at the time of the research. The reasoning behind this partition is to uncover behavioral action taken toward ad-blocker software use regardless of current usage by the consumer. Thus, in the analysis of the questionnaire those who have used ad-blocker software at any given time will be considered as those who are capable and willing to use ad-blocker software. This approach was shaped according to ad-blocker software research, such as the ones done by Yan et al. – in which use of ad-blocker software is regarded as used at any time, and not only currently (Yan, Miller, & Skiera, 2022). The reasoning behind the approach is that consumers may switch devices regularly and they may not always have the opportunity to employ such software at any given time. Therefore, this study will investigate whether a given consumer has ever used an ad-blocking software as the dependent variable.

Consumer attitude toward adblockers will be used as a comparative alternate dependent variable in order to understand how the attitude and actual use of ad-blockers differ in consumer behavior.

4.3. Measurement of Dependent and Independent Variables

In order to gather data for the constructs proposed in this study, the following questionnaire was implemented shown in the appendices section. The descriptive scales used in this literature have been previously used in multiple studies and were found to be reliable measurements. The scale “Attitude toward Ad-Blocker” software, solely, was developed for this thesis and was shown to be reliable and significant in the following factor analysis. This analysis can be found in the exploratory factor analysis section. The questionnaire was employed in Turkish as the sample used for the study consisted of Turkish consumers. To ensure conceptual

consistency, back translations were performed by a group of academic professionals who are fluid in both English and Turkish.

5. RESEARCH FINDINGS

5.1. Descriptive Statistics for Demographic Variables

Descriptive statistics used for this study are age, gender, education level and income. Each statistic was asked with a multiple-choice design and there were no open-ended questions in this section. The groupings for answers and the major demographic distribution of the study are displayed in Table 2 Demographic Characteristics of Survey Respondents (n=200).

Table 1 Demographic Characteristics of Survey Respondents (n=200)

		N	Percentage
Gender	Female	129	64.5%
	Male	62	31%
	Other	2	1%
	I do not want to specify	7	3.5%
Education	Primary School	1	0.5%
	Middle School	-	-
	High School	14	7.5%
	University	127	63.5%
	Graduate	45	22.5%
	Ph.D.	13	6.5%
Income	Less than ₺2499	34	17%
	₺2500 - ₺4999	38	19%
	₺5000 - ₺7499	55	27.5%
	₺7500 - ₺9999	21	10.5%
	More than ₺10000	52	26%
Age	18-24	37	18.5%
	25-34	60	30%
	35-44	55	27.5%
	45-54	20	10%
	55-64	21	10.5%
	Higher than 65	7	3.5%

Almost 65% of the participants identified as female. 31% of the participants, in turn, identified as male. Education level was identified as the level being studied currently or the final level that was graduated from. This was done to be able to differentiate university students from high school graduates as education level for a topic where technological savviness is important the difference is significant. Almost 63% of the participants declared that they either hold bachelor's degrees or are studying at the university for a bachelor’s degree.

Income levels were not adjusted by inflation at the time of this analysis, however, there appeared to be an equal distribution of different income levels across participants.

Most of the participants are found to be between 35 and 44 years of age consisting of 27.5% of the entire group of participants. The next most common age group is between 18 and 24, making up 18.5% of the participants.

Research shows that historically men have more positive tendencies toward advertising than women (Shavitt, Lowrey, & Haefner, 1998). Bush et al. (1999) discuss that gender could be one of the very few descriptive social structure variables that can correlate with attitude toward advertising (Bush, Smith, & Martin, 1999). It is therefore important to examine whether there are any connections between any of the demographic statistics and ad-blocker use.

5.2. Exploratory Factor Analysis (EFA) & Construct Reliability Analysis

Factor analysis was used to determine whether the scales used to measure the constructs of skepticism toward advertising, attitude toward advertising and attitude toward authority (conformity to power) were compatible with the selected sample for this study. As first developed by Spearman in the beginning of the 1900's, the factor analysis technique was commonly applied more frequently with the advances in computer science after the 1970's.

Factor analysis in this type of study is useful for two purposes. The first purpose is to regroup and simplify the scales that hold multiple items in a statistically meaningful way to provide us meaningful factors for further analysis. This is done for each construct. The extent to which this data is found useful and fit for the factor analysis, Barlett and Kaiser-Mayer-Olkin results were obtained. For the KMO test the lower acceptable limit was taken as 0.50 and for the Barlett test the upper limit for p was taken as 0.05.

The second purpose for the factor analysis is to determine the internal consistency reliability of the factors extracted in the exploratory factor analysis. That is, the resultant factors are validated prior to entering them in further statistical analysis. The validation is done by Cronbach's alpha.

We determine the reliability of each factor separately by including the selected items per factor in Cronbach alpha test. For high reliability an alpha measurement above 0.7 was taken as an acceptable index. In relevant literature Cronbach alpha values between 0.60 and 0.80 are considered moderate and acceptable, while values above 0.80 are considered excellent (Bernstein & Bernstein, 1994).

5.2.1. Factor and Reliability Analysis for Skepticism Toward Advertising

First, an exploratory factor analysis was conducted on the multi-item scale that measures the construct of skepticism toward advertising. The purpose was to regroup and simplify the scale in order to obtain meaningful factors for further analysis. Then, Cronbach's alpha coefficient was obtained to assess the validity of the resultant skepticism toward advertising construct.

After using Kaiser-Mayer-Olkin and Bartlett's test for the factor the results (KMO=0.915, $\chi 2$ Bartlett test 766.318, df=36, p=0.000) were found to be adequate. Anti-image correlation diagonals are all exceeding 0.50, meaning every single item in the factor analysis is to be involved. No individual items were necessary to be excluded. As a result, one dimension was found to explain the total variance of 53.5%.

Cronbach's alpha coefficients result for Skepticism toward advertising was found to be 0.887, thus it is confirmed as excellent. The results for factor loading variance explanation and reliability can be found in **Table 3 Factor Analysis for Skepticism Toward Advertising.**

Table 2 Factor Analysis for Skepticism Toward Advertising

Factor Name	Factor Item	Factor Loading	% Variance	Reliability
Skepticism Toward Advertising	Skepticism_Toward_Advertising_1	0.780	**53.45**	**0.887**
	Skepticism_Toward_Advertising_4	0.770		
	Skepticism_Toward_Advertising_8	0.769		
	Skepticism_Toward_Advertising_3	0.768		
	Skepticism_Toward_Advertising_5	0.766		
	Skepticism_Toward_Advertising_7	0.726		
	Skepticism_Toward_Advertising_6	0.664		
	Skepticism_Toward_Advertising_9	0.663		
	Skepticism_Toward_Advertising_2	0.659		

5.2.2. Factor and Reliability Analysis for Attitude toward Advertising

An exploratory factor analysis on the 9-item scale that was used to measure Attitude toward advertising resulted in 3 factors, which were named overall attitude toward advertising, promotes consumption and positive effect of advertising. Then, the reliability of each of the three factors was assessed respectively using Cronbach's alpha. The 2-item overall attitude toward advertising was removed from further analysis due to its unsatisfactory reliability score (Cronbach's alpha of 0.534).

The two remaining two dimensions named as "Promotes Consumption" and "Positive Effect of Advertising" were found reliable as a result of this analysis and the total variance explained was found to be 59.26%. These dimensions are as shown in Table 4 Factor Analysis for Attitude Toward Advertising.

Table 3 Factor Analysis for Attitude Toward Advertising

Factor Name	Factor Item	Factor Loading	% Variance	Reliability
Promotes Consumption	Promotes_consumption_3	0.813	**30.49**	**0.700**
	Promotes_consumption_4	0.809		
	Promotes_consumption_2	0.656		
	Promotes_consumption_1	0.605		
Positive Effect of Advertising	Positive_effect_of_advertising_2	0.824	**28.78**	**0.737**
	Positive_effect_of_advertising_3	0.798		
	Positive_effect_of_advertising_1	0.787		

5.2.3. Factor and Reliability Analysis for Attitude toward Authority

An exploratory factor analysis on the 5-item scale that was used to measure Attitude toward authority provided 1 factor, so all items were kept. The Cronbach's alpha coefficient of 0.744 confirmed the reliability of this factor. The statistical results are provided in Table 5 Factor Analysis for Conformity to Power (Attitude toward Authority).

Table 4 Factor Analysis for Conformity to Power (Attitude toward Authority)

Factor Name	Factor Item	Factor Loading	% Variance	Reliability
Conformity to Power	Comformity_to_Power_2	0.786	**51.32**	**0.744**
	Comformity_to_Power_1	0.761		
	Comformity_to_Power_4	0.747		
	Comformity_to_Power_3	0.740		
	Comformity_to_Power_5	0.513		

As a result, we can accept that the reliability of the scale is confirmed. One dimension was found to explain 51.32% of the variance.

5.2.4. Factor and Reliability Analysis for Attitude toward Ad-Blockers

Attitude toward ad-blockers was measured using an 8-item scale. The 4th item was reverse-coded. Interestingly, consumer responses to items questions 6 and 7 – while expected to be inversely correlated with benefits of ad-blockers, were found to be directly correlated. This indicates that consumers do actually like that advertisers and media outlets are financially damaged by ad-blockers. This finding would make an interesting topic for future research.

Overall, 5 items measuring attitude toward ad-blockers were found to be reliable with a Cronbach's alpha coefficient of 0.834. As higher than aimed 0.70, reliability of the scale is confirmed. Results such as factor loadings, variance explained, and reliability can be seen in Table 6 Factor Analysis for Attitude toward Ad-Blockers.

Table 5 Factor Analysis for Attitude toward Ad-Blockers

Factor Name	Factor Item	Factor Loading	% Variance	Reliability
Overall Attitude Toward Adblockers	Overall_Attitude_toward_adblockers_3	0.873	**60.46**	**0.834**
	Overall_Attitude_toward_adblockers_1	0.806		
	Overall_Attitude_toward_adblockers_5	0.796		
	Overall_Attitude_toward_adblockers_8	0.763		
	Overall_Attitude_toward_adblockers_2	0.629		

As a result, it can be confirmed that the scale is reliable. One dimension was found which explains a total of 60.46% of variance.

5.2.5. Factor and Reliability Analysis for Advertising Avoidance

Advertising avoidance has been studied through two factors, behavioral avoidance, and mechanical avoidance, with 3 and 4 item scales respectively. For behavioral avoidance all items were found to fit the model. For mechanical avoidance one item was removed. The results of the factor analysis can be seen in Table 7 Factor Analysis for Advertising Avoidance.

Table 6 Factor Analysis for Advertising Avoidance

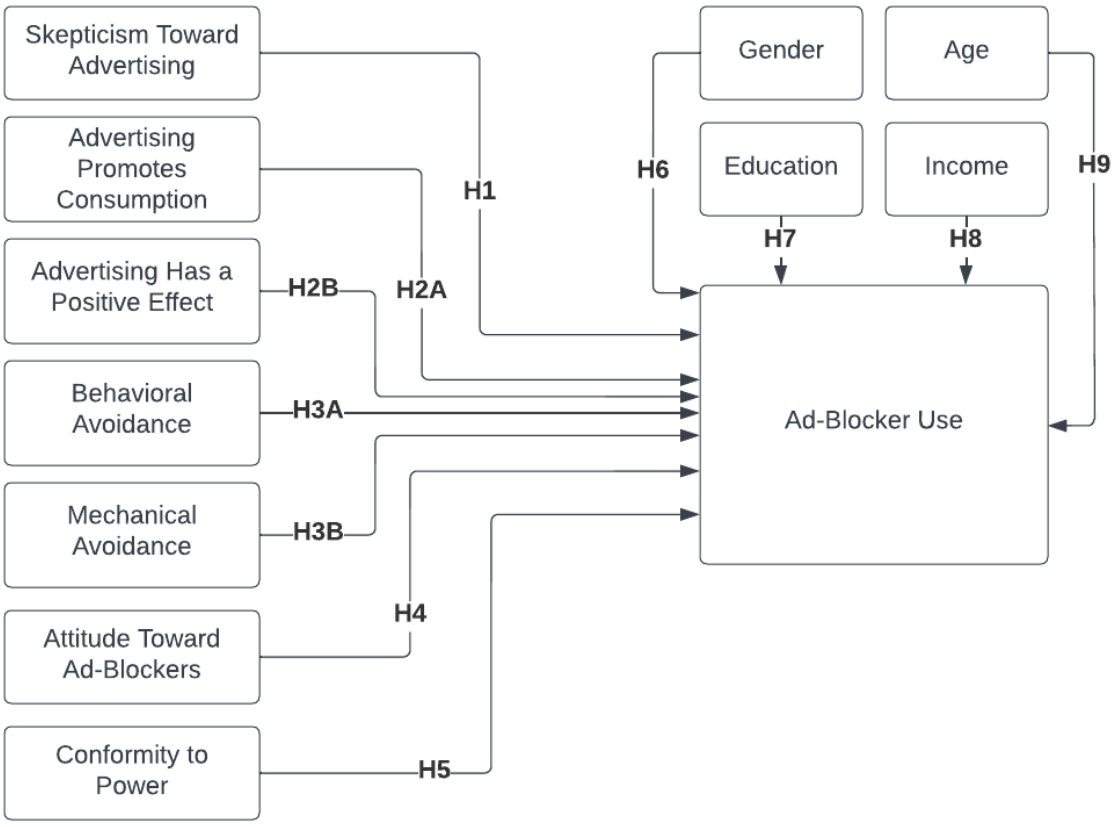
Factor Name	Factor Item	Factor Loading	% Variance	Reliability
Behavioral Avoidance	Behavioral_Avoidance_3	0.823	**29.20**	**0.645**
	Behavioral_Avoidance_2	0.760		
	Behavioral_Avoidance_1	0.624		
Mechanical Avoidance	Mechanical_Avoidance_3	0.810	**28.78**	**0.602**
	Mechanical_Avoidance_4	0.769		
	Mechanical_Avoidance_2	0.585		

5.2.6. Revised Conceptual Research Model and Hypotheses

The scales used to measure the constructs in the model were revised based on the results of the exploratory factor analyses. The construct "Attitude Toward Advertising" was split into two separate factors, namely "Advertising Promotes Consumption" and "Advertising Has a Positive Effect". Due to the wording of some items, reverse coding has been applied to ensure they indicate toward the same behavioral end of the spectrum. The hypothesis H2 linked to the original construct has also been split into H2A and H2B to correctly measure the respective effects of the two factors in the subsequent statistical analyses.

Advertising avoidance for conventional media construct has also been split into two factors, namely “Behavioral Avoidance” and “Mechanical Avoidance”. Such multifactorial nature was already expected as the original research by Rojas-Méndez JI and Davies G. indicated that these two behavioral patterns are separate in their design (Rojas-Méndez JI, 2005). The hypothesis linked to the original construct was also split in two, namely H3A and H3B to correctly measure their effect in the subsequent statistical analyses. The revised model for this research in the light of the initial exploratory factor analysis can be seen in Figure 7 Revised Model 1.

Figure 7 Revised Model 1



5.3. Revised Hypotheses

As a result of factor analysis done for the study, the hypotheses were revised as can be seen in Table 8 Revised Hypotheses.

Table 7 Revised Hypotheses

H_1: Skepticism toward advertising has an effect on use of ad-blocker software.
H_{2A}: Excessive consumption fear has an effect on use of ad-blocker software.
H_{2B}: Positive look on advertising's effects has an effect on use of ad-blocker software.
H_{3A}: Tendency to behaviorally avoid advertising has an effect on use of ad-blocker software.
H_{3B}: Tendency to mechanically avoid advertising has an effect on use of ad-blocker software.
H_4: Attitude toward ad-blockers has an effect on use of ad-blocker software.
H_5: Conformity to power has an effect on use of ad-blocker software.
H_6: Gender has an effect on use of ad-blocker software.
H_7: Education has an effect on use of ad-blocker software.
H_8: Income has an effect on use of ad-blocker software.
H_9: Age has an effect on use of ad-blocker software.

5.4. Confirmatory Factor Analysis

Confirmatory Factor Analysis (CFA) was initially developed as test by Jöreskog in the 1960s (Schumacker & Lomax, 2010).The aim of this test is to see whether items together are able to create and define a construct. While performing CFA, it is necessary for the research to have priorly specified a theoretical model. So, a theoretical background is most required. Factors, and their relations with regard to the observed variables have to be predefined before the statistical analysis. Following this, the main goal is to perform a test on the sample data to see whether it fits the hypothesized model of measurement. This has to be based on theory or appropriate research. In order to apply CFA to a certain model, it is necessary to identify the number of factors, how many factors are correlated and to which extent a given variable measure each factor individually (Schumacker & Lomax, 2010).

For the purpose of the analysis of this study, CFA was performed on 32 items in order to validate the measurement model. Doing this convergent and discriminant validity was assessed. The assessment of the model fit was done using the standardization method where all covariances were set to 1.0 (Teo, Tsai, & Yang, 2013).

The goodness of fit for the measurement models was assessed by $\chi 2$, Root Mean Square of Error Approximation (RMSEA), Tucker-Lewis Index (TLI), Comparative Fit Index (CFI), Normed Fit Index (NFI) and Goodness of Fit Index (GFI). Acceptable and Excellent limit values of these measures can be seen in Table 9 Goodness of Fit Measurement (Hu & Bentler, 1999).

Table 8 Goodness of Fit Measurement

Goodness of Fit Indices	Excellent Fit	Acceptable Fit
χ^2/df	$0 \leq \chi^2/df \leq 2$	$2 \leq \chi^2/df \leq 5$
GFI	$0.95 \leq GFI < 1.00$	$0.90 \leq GFI < 0.95$
CFI	$0.95 \leq CFI < 1.00$	$0.90 \leq CFI < 0.95$
NFI	$0.95 \leq NFI < 1.00$	$0.90 \leq NFI < 0.95$

TLI	$0.95 \leq TLI < 1.00$	$0.90 \leq TLI < 0.95$
RMSEA	$0.00 \leq RMSEA < 0.05$	$0.05 \leq RMSEA < 0.08$

To confirm these results CFA was then conducted.

Figure 8 CFA Diagram of Constructs

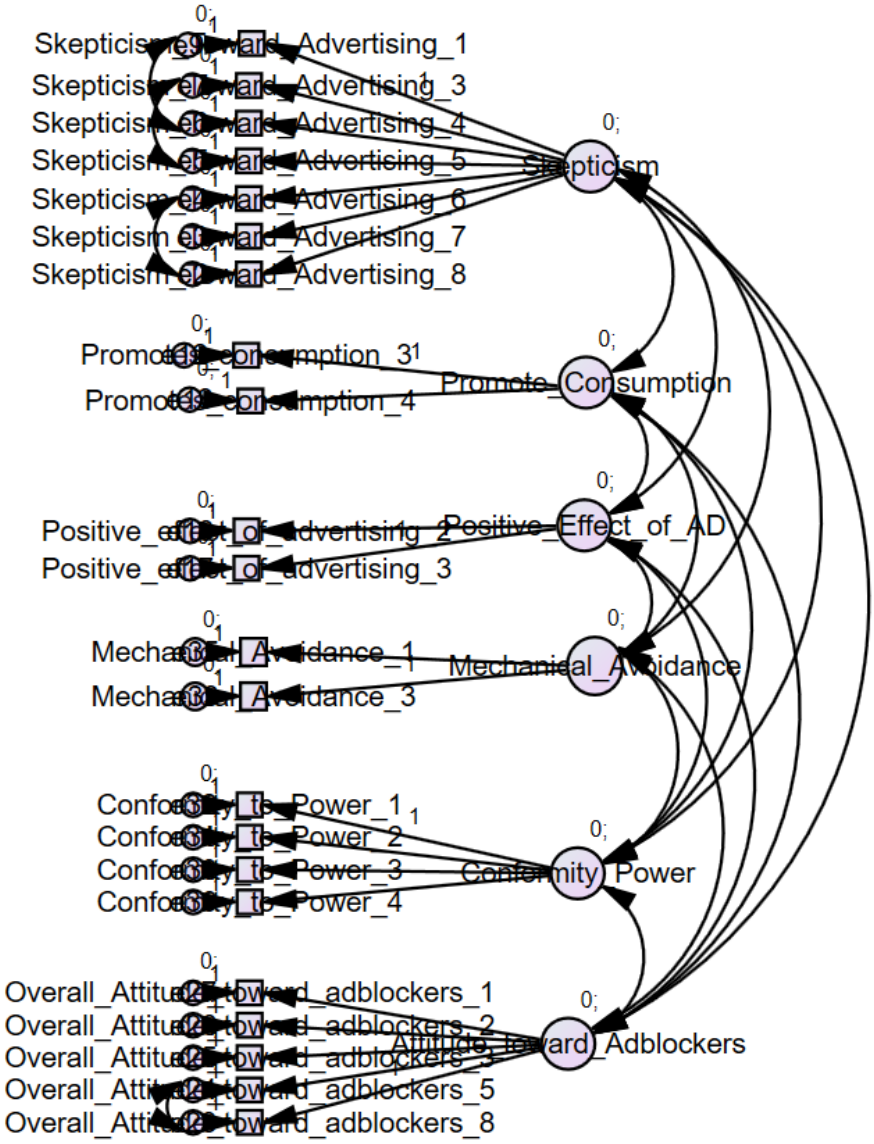


Table 9 Confirmatory Factor Analyses for Constructs

Items	CFA Loadings	t-value
Skepticism Toward Advertising (CR=0.822 AVE=0.516)		
Skepticism_Toward_Advertising_8	0.733	9.687***
Skepticism_Toward_Advertising_7	0.693	9.269***
Skepticism_Toward_Advertising_6	0.663	8.744***
Skepticism_Toward_Advertising_5	0.738	9.764***
Skepticism_Toward_Advertising_4	0.751	11.922***
Skepticism_Toward_Advertising_3	0.723	9.554***
Skepticism_Toward_Advertising_1	0.723	a
Promotes Consumption (CR=0.742 AVE=0.592)		
Promotes_consumption_3	0.838	a
Promotes_consumption_4	0.694	4.729***
Positive Effect of Advertising (CR=0.702 AVE=0.542)		
Positive_effect_of_advertising_3	0.685	a
Positive_effect_of_advertising_2	0.784	7.262***
Overall Attitude Toward Adblockers (CR=0.834 AVE=0.507)		
Overall_Attitude_toward_adblockers_8	0.650	a
Overall_Attitude_toward_adblockers_5	0.697	9.470***
Overall_Attitude_toward_adblockers_3	0.872	9.348***
Overall_Attitude_toward_adblockers_2	0.544	6.677***
Overall_Attitude_toward_adblockers_1	0.758	8.739***
Conformity Power (CR=0.772 AVE=0.458)		
Comformity_to_Power_3	0.689	7.580***
Comformity_to_Power_2	0.697	7.634***
Comformity_to_Power_1	0.686	a
Comformity_to_Power_4	0.634	7.163***
Mechanical Avoidance (CR=0.701 AVE=0.465)		
Mechanical_Avoidance_3	0.579	a
Mechanical_Avoidance_1	0.771	4.628***
χ^2 (190, N=200)= 221.826; p=0.057; RMSEA= 0.029; TLI= 0.975; CFI= 0.980; NFI= 0.877 GFI=0.911		

CR= Composite Reliability, AVE= Average Variance Extracted, * p< .05, ** p< .01, *** p< .001, RMSEA= Root Mean Square of Error Approximation, TLI= Tucker-Lewis Index, CFI= Comparative Fit Index, NFI=Normed Fit Index GFI=Goodness of Fit Index

According to the work of Fornell and Larcker (1981), convergent validity could be assessed with composite reliability (CR) and average variance extracted (AVE) (Fornell & Larcker, 1981).

Convergent validity for the purpose of this study is used to measure the level of correlation of multiple variables of same constructs that agree. To establish such a convergent validity, factor loadings of indicator variables, the average extracted variance (AVE) and composite reliability (CR), have to be taken into consideration. The recommended cutoff thresholds for these measures state that the AVE should generally be above 0.50 and the CR should be 0.70 and above (Huang, Wang, Wu, & Wang, 2013).

Table 10 CR, AVE and MSV Results

Latent Factor	**CR**	**AVE**	**MSV**
Skepticism Toward Advertising	0.822	0.516	0.470
Conformity to Power	0.772	**0.458**	0.137
Overall Attitude Toward Adblockers	0.834	0.507	0.164
Positive Effect of Advertising	0.702	0.542	0.470
Promotes Consumption	0.742	0.592	0.157
Mechanical Avoidance	0.701	**0.465**	0.285

Evaluation of the convergent validity of the study was done using AVE and CR values computed through Plugins (Gaskin, 2016) and factor loadings of CFA was computed in AMOS (Gaskin, 2016). The AVE values for the six-factor model had a range between 0.458 to 0.592. The CR values, on the other hand ranged from 0.701 to 0.834 as can be seen in **Table 11 CR, AVE and MSV Results**

While the resulting AVE value for the two factors were below the acceptable minimum cutoff point of 0.50, convergent validity may be adequate because all latent factors showed to have CR values which are above 0.70 (Fornell & Larcker, 1981). It is also stated by Malhotra and Dash (2011) that the AVE can often be too strict, and validity can solely be established through CR (Malhotra & Dash, 2011).

The resulting maximum shared variance (MSV) was also compared to the AVE values. The AVE values have to be greater than the MSV values for considering each latent factor (Rebelo-Pinto, Pinto, Rebelo-Pinto, & Paiva, 2014). As evident in **Table 10 CR, AVE and MSV Results** not all latent factors met the requirements, and their discriminant validity may not be enough. However, for the five-factor model the square root of all the AVE for all latent factors were greater than 0.50 but not greater than inter-latent factor correlations for all factors. The square root of AVE for subjectivity was less than its correlation as found to be in scientific methods **Table 10 CR, AVE and MSV Results.**

5.5. Dependent Variable

The initial research model and hypotheses of this study predicted a significant use case difference among consumers for mobile and desktop ad-blocker software. This separation was suggested throughout the literature and was supported by the latest research done by Hootsuite (Hootsuite, 2022). According to the data, there are a significantly a smaller number of individuals using mobile ad-blocker software compared to desktop ad-blocker software users (Hootsuite, 2022). Reasons behind this phenomenon are commonly listed as, firstly the difficulty of installing and maintaining such software in a wide variety of operating systems and secondly the limitations of mobile operating systems providing their consumers with technical freedom.

Another factor for this disparity can be stated as the necessary technical prowess for a given consumer to be able to modify their mobile browsers for use of such

software. Besides, many applications used on mobile devices integrate their own browsers within the application, virtually disabling any user configuration to be manually added afterwards.

All of these factors result in a use-case outcome, where mobile ad-blocker use numbers depend highly on technical savviness. For the purpose of this research, mobile ad-blocker use has been separately asked in the survey, to be able to distinctly separate these technical abilities from the dependent variable.

As such, all of the following analysis done on the data uses desktop ad-blocker software use as their basis.

5.6. Recoding the Dependent Variable

The dependent variable of the study was collected as a response to the following question in **Table 11 Dependent Variable Question from Study Survey.**

Table 11 Dependent Variable Question from Study Survey

Do you use ad-blocker software on your desktop devices?
a) I have never used ad-blocker software
b) I have used in the past
c) Yes, I do

In line with the purpose of this study, ad-blocker software use penetration is a key indicator of whether an individual would take necessary steps to actively block advertising on their desktop consumers. To this end, it is of critical importance to identify consumers who have used ad-blocker software in the past but are not using it at the moment for any given reason. The extent of these reasons to why these consumers stopped using ad-blocker software are out of scope for the purposes of this study.

To this end, the dependent variable was recoded to be used in a binary logistic regression analysis, to include those who have used an ad-blocker software in the past and those who are using the software at the time of the survey into a single response which is "Yes". The respondents who have never used an ad-blocker software have, on the other hand, been re-coded as having the response "No".

A total of 182 respondents were selected for the binary regression analysis as valid candidates for the research due to missing responses for overall factor analyses in the study. Individual factor analyses, however, take valid responses for each for their own.

The case processing summary of the analysis can be seen in **Figure 9 Case Processing Summary.**

Figure 9 Case Processing Summary

Unweighted Cases[a]		N	Percent
Selected Cases	Included in Analysis	182	91,0
	Missing Cases	18	9,0
	Total	200	100,0
Unselected Cases		0	,0
Total		200	100,0

Out of these 182 respondents 83 have indicated that they have, or they do use ad-blocker software, where 99 have responded that they have never used ad-blocker software. These responses can be seen in **Figure 10 Observed Responses & Null Model** (which assigns all respondents to highest frequency category).

Figure 10 Observed Responses & Null Model

			Predicted		
			AdBlocker_Use		Percentage Correct
	Observed		1,00	2,00	
Step 0	AdBlocker_Use	1,00	99	0	100,0
		2,00	83	0	,0
	Overall Percentage				54,4

5.7. Binary Logistic Regression Analysis

Several binary logistic regression analyses were performed to test the hypotheses and validate the proposed model of the study. These analyses include an overall model analysis as well as separate construct analyses for hypothesis testing, specifically to determine the strength of each construct in predicting whether a given consumer has ever used ad-blocker software or not. Binary logistic regression was deemed appropriate because the dependent variable is binary.

5.7.1. Overall Model Analysis

The constructs defined and validated earlier in the thesis constitute the dependent and independent (exploratory) variables in the overall model. In addition, demographic variables are also included as independent variables. Specifically, the dependent variable is desktop ad-blocker software use, and the independent variables are listed in Figure 15.

An Omnibus Tests of Model Coefficients is used to confirm that the model is an improvement over the baseline or non-existing model. It uses chi-square tests to see if there is a significant difference between the baseline model and the proposed model. All Sig. values of Step, Block and Model methods have a p value of <,001. This implies that the specified model with its explanatory variables is statistically significant.

Figure 11 Omnibus Tests of Model Coefficients

		Chi-square	df	Sig.
Step 1	Step	47,585	11	<,001
	Block	47,585	11	<,001
	Model	47,585	11	<,001

The **Figure 12 Model Summary** provides the -2 Log Likelihood and Pseudo R Square values for the full model. The -2 Log Likelihood value for this model is what was compared to the -2 Log Likelihood value for the null model in the "omnibus test of model coefficients". This indicates that there was a significant

decrease in the -2 Log Likelihood. This shows that the model is a significantly better fit than the null model. The R Square values indicate approximately how much of the total variation in the outcome is explained by the model. Nagelkerke's R Square is generally considered when understanding this coverage, which suggests that the model explains roughly 40% of the variation in the outcome. It is noted in the literature that the R2 values are approximations and should not be overly emphasized.

Figure 12 Model Summary

Step	-2 Log likelihood	Cox & Snell R Square	Nagelkerke R Square
1	103,383[a]	,296	,396

The Hosmer & Lemeshow test **(Figure 13 Hosmer and Lameshow Test)** for the goodness of fit suggests that the model is a good fit to the data as p=0.773 (>.05). However, the chi-squared statistic on which it is based is very dependent on sample size so the value cannot be interpreted in isolation from the size of the sample.

Figure 13 Hosmer and Lameshow Test

Step	Chi-square	df	Sig.
1	4,851	8	,773

The observed and predicted values for the Hosmer and Lameshow test further indicate that the data fits the model as there is minimal difference between these values. The results can be seen in **Figure 14 Contingency Table for Hosmer and Lameshow Test.**

Figure 14 Contingency Table for Hosmer and Lameshow Test

		AdBlocker_Use = 1,00		AdBlocker_Use = 2,00		
		Observed	Expected	Observed	Expected	Total
Step 1	1	10	9,580	0	,420	10
	2	8	8,591	2	1,409	10
	3	7	7,688	3	2,312	10
	4	7	7,222	3	2,778	10
	5	8	6,496	2	3,504	10
	6	4	5,637	6	4,363	10
	7	6	4,472	4	5,528	10
	8	4	3,340	6	6,660	10
	9	1	1,985	9	8,015	10
	10	1	,989	10	10,011	11

The significance of individual variables, or factors, in the study with regards to the proposed model can be seen in **Figure 15 Variables in the Equation.**

Figure 15 Variables in the Equation

	B	S.E.	Wald	df	Sig.	Exp(B)
Skepticism	-,061	,356	,029	1	,864	,941
Promotes Consumption	,064	,279	,052	1	,819	1,066
Has a Positive Effect	,497	,398	1,559	1	,212	1,644
Behavioral Avoidance	,672	,296	5,151	1	,023	1,958
Mechanical Avoidance	,382	,304	1,578	1	,209	1,465
Ad-Blocker Attitude	,921	,340	7,323	1	,007	2,511
Conformity to Power	,188	,277	,462	1	,497	1,207
Gender	,879	,467	3,548	1	,060	2,410
Age	-,682	,238	8,237	1	,004	,506
Education Level	-,339	,409	,684	1	,408	,713
Income	,341	,232	2,163	1	,141	1,407
Constant	,453	1,449	,098	1	,755	1,573

Three variables in the equation have significant p values and one has near-significance. Significant variables are ad blocker attitude (B=.932 and Sig. = 007), age (B=-.682, Sig.=.004) and behavioral avoidance (B=.672, and Sig.=.023). Gender is marginally significant (B=.879, Sig.=.060). The remining independent variables turn out not to be significant, however, this does not necessarily imply that they are not significantly related to the dependent variable. This is because some significant relations are masked by multicollinearity (i.e., high correlation)

between the independent variables. That is, if an independent variable which is significant in explaining the dependent variable is highly correlated with other independent variable(s), then the effect of the latter independent variables becomes redundant because their effect has already been explained. The presence of multicollinearity among the independent variables affects the value of regression coefficients and the corresponding significance levels for independent variables. However, the presence of multicollinearity among the independent variables does not affect the predictive effectiveness of the overall regression equation, which is discussed next.

This study attempts to find out whether it is possible to predict a given consumer's likelihood of using ad-blocker software. The findings confirm that the model provides significantly better prediction values for both positive and negative predictions of use cases.

Overall, the model provides a 72,3% correct prediction rate for all respondents. This result can be seen in **Figure 16 Model Prediction Results**.

Figure 16 Model Prediction Results

			Predicted		
			AdBlocker_Use		Percentage Correct
	Observed		1,00	2,00	
Step 1	AdBlocker_Use	1,00	44	12	78,6
		2,00	16	29	64,4
	Overall Percentage				72,3

5.8. Hypothesis Results

Table 12 Results of the Hypotheses

H_1: Skepticism toward advertising has an effect on use of ad-blocker software.	**Rejected**

H_{2A}: Excessive consumption fear has an effect on use of ad-blocker software.	**Rejected**
H_{2B}: Positive look on advertising's effects has an effect on use of ad-blocker software.	**Rejected**
H_{3A}: Tendency to behaviorally avoid advertising has an effect on use of ad-blocker software.	**Supported**
H_{3B}: Tendency to mechanically avoid advertising has an effect on use of ad-blocker software.	**Rejected**
H_4: Attitude toward ad-blockers has an effect on use of ad-blocker software.	**Supported**
H_5: Conformity to power has an effect on use of ad-blocker software.	**Rejected**
H_6: Gender has an effect on use of ad-blocker software.	**Marginally supported**
H_7: Education has an effect on use of ad-blocker software.	**Rejected**
H_8: Income has an effect on use of ad-blocker software.	**Rejected**
H_9: Age has an effect on use of ad-blocker software.	**Supported**

6. FINDINGS & REVISED MODEL

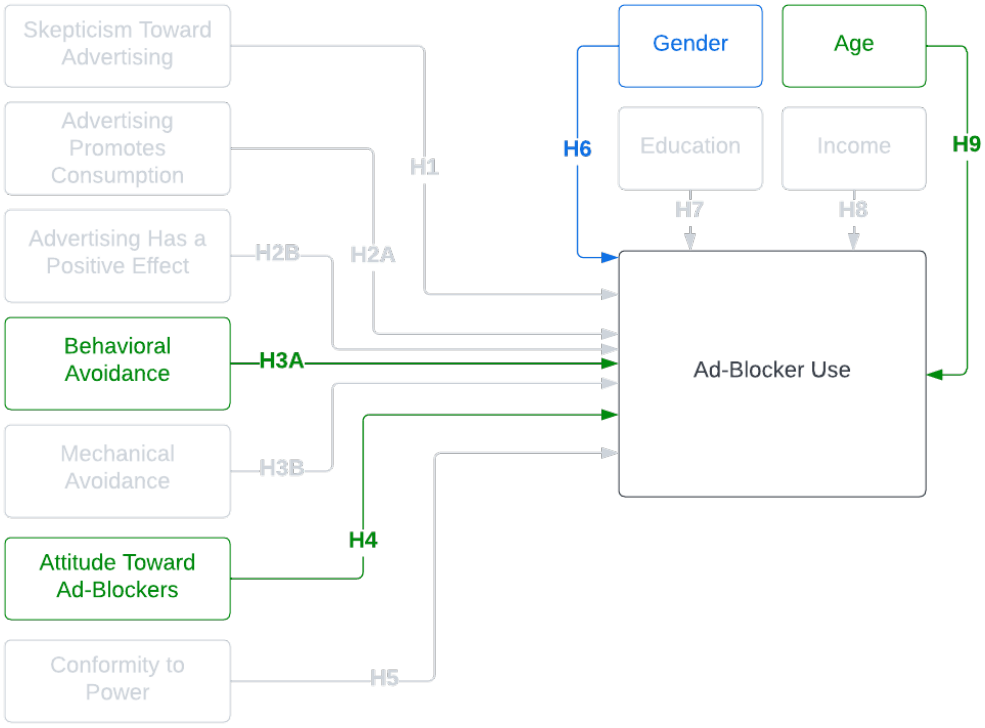
Although the rejection of several hypotheses due to inconclusive correlations, the overall model provides a healthy predictive value as the conclusion of this study. Skepticism, particularly as the main academic subject of this study, does not hold high predictive value in understanding consumer behavior of using ad-blocker software.

However, consumer attitude towards ad-blocker software proves to be significant in predicting consumer behavior in the subject. This can be deduced to a consumer's awareness of ad-blocker software being a key indicator toward their acceptance or adoption of such tools for their use.

Behavioral avoidance tendency is another key factor that turned out significant in the study. This finding implies that there is an underlying link in why consumers tend to behaviorally avoid advertising and why they tend to use ad-blocker software. Research in this field heavily focuses on mechanical avoidance, as use of software would otherwise fall under this category.

Revision to the model as per the provided research can be seen in **Figure 17 Revised Model.**

Figure 17 Revised Model



6.1. Implications

6.1.1. Academic Implications

Behavioral avoidance of consumers toward advertising is a topic that is mainly present in the current literature in terms of conventional advertising (Awan & Zuriat-ul-Zahra, 2014). This study shows that modern ad-avoidance behavior is a topic of interest with digital media as well. Ad-blockers, due to their technical nature, are widely studied in technical terms in the literature (Nithyanand, et al., 2016). This research shows that there is a wide and undiscovered range of factors that may be affecting a consumer's use of ad-blocking software.

Although the model provided in this study predicts a given consumer's likelihood of resorting to ad-blocker software with significantly higher percentages than a null model, there is certain room for future research to shed light on.

Another implication of this study is that consumer behavior with regards to blocking advertising digitally does not directly stem from a consumer's dislike or skepticism toward advertisements in general. This means that while skeptic consumers are more likely to distrust advertisers, consumers who would otherwise be perfectly valid target for advertising strategies could also be missed due to their use of advertising blocker software.

Links with gender and age biases must also be carefully considered in understanding the ad-blocker phenomenon, since younger generations will prove to have a better tendency to use technology in a relatively advanced manner. This research shows that such considerations must be made through global research in understanding the implications of the wide adoption of ad-blocker software.

6.1.2. Managerial Implications

Managers are primarily concerned with maximizing the cost-effectiveness of their advertising (Ronald E. Goldsmith, 2000). While measuring cost is relatively straightforward, measuring effectiveness has traditionally been a difficult task. However, with the advent of the post-digital era, the advent of digital technology has enabled managers to measure the effectiveness of advertising via online numerical metrics, such as "reach" (Clemons, 2019). This has led to the widespread use of these metrics by marketers as a way to measure the success of digital advertising campaigns.

However, the reliance on online numerical metrics such as "reach" as a measure of advertising effectiveness can give the false impression that a digital campaign is successful as long as it meets the preset numerical goals. This approach, however, ignores the fact that consumers are increasingly using behavioral avoidance strategies to avoid advertising, such as ad-blocking software use. These strategies can have a significant impact on the effectiveness of advertising, and therefore should be considered when measuring advertising success.

This study argues that from a managerial perspective, advertising success metrics should be reconsidered to account for behavioral advertising avoidance strategies of consumers on post-digital media. This means that managers should not rely solely on online numerical metrics such as "reach" to measure the effectiveness of their advertising but should also consider the impact of behavioral avoidance strategies on advertising effectiveness.

One approach to measuring advertising effectiveness in the post-digital era is to consider the impact of behavioral avoidance strategies on advertising recall and brand recall. Advertising recall measures the extent to which consumers are able to recall an advertisement that they have seen, while brand recall measures the extent to which consumers are able to recall a brand that they have seen. These metrics can provide a more accurate picture of advertising effectiveness, considering the impact of behavioral avoidance strategies.

Another approach is to consider the impact of behavioral avoidance strategies on engagement metrics. Engagement metrics, such as time spent on a website or the number of clicks on an advertisement, can provide insight into how effectively an advertisement is able to engage with consumers.

Thus, this study further aims to suggest that from a managerial perspective, advertising success metrics should be reconsidered to account for behavioral advertising avoidance strategies of consumers on post-digital media.

6.2. Limitations

This study was conducted on a relatively small scale and in a single country. While the results of this study provide valuable insights into consumer behavior towards ad-blocking software, it is important to note that the issue at hand is a global concern. Therefore, the focus of this study on a single country may prove to be a significant limitation in understanding the ad-blocker phenomenon on a global scale.

To fully comprehend the global ad-blocker phenomenon, it would be important to conduct research on a larger scale and in multiple countries, to gain a more comprehensive understanding of consumer behavior towards ad-blocking software in different cultural and socioeconomic contexts. Furthermore, research should be conducted in different languages, as language and culture play a significant role in shaping consumer attitudes and behaviors.

Moreover, this research was conducted from the perspective of a single branch of academia. While the findings of this study provide valuable insights into consumer behavior towards ad-blocking software, it is important to note that other cognitive disciplines such as psychology, anthropology, and sociology could also provide valuable insights into this issue. For example, psychology could provide insight into consumer motivations, beliefs, and attitudes towards ad-blocking software, while sociology could provide insight into the role of social norms and cultural factors in shaping consumer behavior towards ad-blocking software. Similarly, anthropology could provide insight into the relationship between consumer behavior and cultural practices.

Additionally, technical disciplines such as computer science could also provide key insights into user experience and other factors that may play key roles in why consumers retreat to the use of limiting software to block advertisers from communicating with them. For example, computer science could provide insight into the design and functionality of ad-blocking software, as well as the user experience of interacting with such software.

Therefore, this study provides valuable insights into consumer behavior towards ad-blocking software, however, the focus of the study on a single country and from a single branch of academia proves to be a significant limitation in understanding the ad-blocker phenomenon on a global scale. Therefore, it is important to conduct research on a larger scale and in multiple countries, in different languages and also to consider other cognitive disciplines such as psychology, anthropology and

sociology and technical disciplines such as computer science to gain a more comprehensive understanding of consumer behavior towards ad-blocking software.

6.3. Future Research

Consumer action in the digital media commonly translates to consumer behavior in daily life, and vice versa. Thus, it is important to transcend digital behavior and consider ad-blocker use with consumer psychology from a comprehensive point of view. Consumer behavior on digital media has traditionally been measured through digital data, such as website analytics and online surveys (Yan, Miller, & Skiera, 2022). This type of data is abundant and provides valuable insights into consumer behavior on digital media platforms. However, it is important to note that this data may unintentionally limit the understanding of consumer behavior to digital behavior only. Consumer behavior on digital media is not isolated and often translates to consumer behavior in daily life, and vice versa. Therefore, it is essential to transcend digital behavior and consider ad-blocker use within the broader context of consumer psychology.

This study aims to provide a basis for such an approach by examining consumer behavior towards ad-blocker software from a multi-disciplinary perspective. By considering consumer attitudes, motivations, and beliefs towards ad-blocker software, this study aims to provide a more comprehensive understanding of the issue at hand.

Furthermore, future research in the field of consumer behavior and ad-blocking software should focus on exploring the following key areas: consumer attitudes towards digital media, advertising myopia in the digital age, and the role of advertising as a store of value. These areas are critical for understanding the reasons and impacts of the global ad-blocker phenomenon and for developing strategies to address it.

In summary, consumer behavior on digital media is commonly measured through digital data, which can limit the understanding of consumer behavior to digital

behavior only. It is essential to transcend digital behavior and consider ad-blocker use within the broader context of consumer psychology. This study provides a basis for such an approach, and future research should focus on exploring areas such as consumer attitudes towards digital media, advertising myopia in the digital age, and the role of advertising as a store of value to better understand the reasons and impacts of the global ad-blocker phenomenon.

CONCLUSION

Consumer attitude toward advertising is shifting alongside the recent changes in advertising – especially in the digital era. As the number of advertisements any given consumer is exposed to everyday increases, ad-nuisance and ad avoidance also increase (Johnson, 2013). It is evident that this phenomenon is not limited only to digital advertising. As seen in studies about the era that is preceding global overtake of digital advertising, consumers already avoiding advertising to a large degree.

However, the current situation in the advertising industry is that advertisers try to overcome the situation through mainly forced exposure (Dentsu, 2021). Forced exposure, in turn, provides entry for a positive feedback loop, where more advertising is needed to convince consumers to ultimate consumer action desired by the advertisers. Besides, ad-blocker software use is not a niche occurrence by any means. It is shown by research that more than half of all consumers on the Internet use a form of ad-blocker software (GlobalWebIndex, 2020). Therefore, a long-term plan and solution to stop the so-called arms race between consumers and advertisers is needed to ensure the most necessary free flow of commercial information exchange.

It is shown in this research that while there are many factors affecting consumer attitude toward ad-blocker software, skepticism toward advertising is not necessarily a root cause. This indicates that while consumers may generally be skeptical toward advertising, they have been so for a very long time. However, increasing amounts of ad-nuisance and annoyance – paired with relatively easier methods of physically avoiding advertising altogether, may play a large part in explaining why so many consumers are turning to ad-blocker software without even giving any commercial communications any chance to begin with. We might be closing in on an era where consumers block communication, without even actually knowing why.

This research suggests that while consumers may have a general skepticism towards advertising, it is not the root cause for their attitude towards ad-blocker software. Instead, factors such as increasing amounts of ad-nuisance and annoyance, coupled with the ease of physically avoiding advertising through the use of ad-blocker software, may play a larger role in driving consumer adoption of ad-blockers. This implies that consumers are increasingly turning to ad-blockers as a means of avoiding unwanted and disruptive advertising experiences, without necessarily being aware of the underlying reasons behind their actions.

This highlights the importance of understanding consumer attitudes towards ad-blocker software, and the role that ad-nuisance and annoyance play in driving consumer adoption. Advertisers and publishers need to take note of this and try to reduce the ad-nuisance and annoyance that their ads may cause, in order to avoid losing the attention of their audience. The methods of reducing the ad-nuisance can include making ads more relevant to the user, making sure they don't disrupt the user's browsing experience and also providing a way for users to give feedback about the ads they see, so that the advertiser can improve them.

Additionally, this research suggests that we may be entering an era where consumers are blocking communications without fully understanding the reasons behind their actions. This highlights the need for greater transparency and communication between advertisers and consumers to ensure that consumers are aware of the potential impact of ad-blockers on the content creators and website owners, who rely on advertising revenue to keep their content free.

This study intentionally excluded examining the technological aspects of ad-blocker software from its scope. However, as technology advances, some form of ad-blocking is done in a purely technological manner without the need for consumer choice or attention. Literature is lacking in terms of cross-disciplined studies that consider how consumer behavior in psychological aspect intersects with that of digital and technological dimensions. Future research is highly encouraged to take

a multi-disciplinary form under these circumstances. This will be discussed in more detail in the appropriate section that follows.

This study, as mentioned, focuses on the psychological aspects of consumer behavior towards ad-blocker software and deliberately excluded the technological aspects of ad-blockers. However, it is important to acknowledge that technology is advancing rapidly, and new forms of ad-blocking are emerging that do not rely on consumer choice or attention. This presents a significant challenge for the advertising industry, as traditional methods of understanding and addressing consumer behavior may no longer be effective.

It is also important to note that literature on this topic is limited in terms of cross-disciplinary studies that examine how consumer behavior, in terms of psychology, intersects with digital and technological dimensions. This is an important gap in the literature, as a multi-disciplinary approach is needed to fully understand the implications of ad-blocker software on the advertising industry.

Future research is highly encouraged to take a multi-disciplinary form in order to address this gap in the literature. This could involve collaboration between experts in psychology, digital technology, and advertising to gain a more comprehensive understanding of the issue. Such research will be important to help the advertising industry adapt and evolve in the face of rapidly advancing technology.

In conclusion, this study focuses on the psychological aspects of consumer behavior towards ad-blocker software but acknowledges that technology is advancing rapidly, and new forms of ad-blocking are emerging that do not rely on consumer choice or attention. It highlights the need for cross-disciplinary studies that examine how consumer behavior in terms of psychology intersects with digital and technological dimensions in order to understand the implications of ad-blocker software on the advertising industry and future research is highly encouraged to take a multi-disciplinary form to address this gap in the literature.

Prior research as discussed in this study found differences in how consumer attitude toward advertising changes across cultures. This study was performed with participants from a single cultural background due to its geographical limitations. A multicultural study aiming to uncover such differences could help not only advertisers from a managerial perspective, but also consumers – as the underlying marketing communications landscape is of paramount importance to free information exchange.

Advertisements as a store of value, especially in the new age social media is yet another up and coming topic that has not been researched in depth in literature yet. This study recommends that future research should also be focused on this topic.

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APPENDICES

APPENDIX A: Survey Form

1. Reklamlar ile ilgili aşağıdaki cümlelere hangi seviyede katılıyorsunuz?

	Kesinlikle Katılmıyorum	Katılmıyorum	Ne Katılıyorum, Ne Katılmıyorum	Katılıyorum	Kesinlikle Katılıyorum
Reklamların çoğu bize doğru bilgiler aktarır	◯	◯	◯	◯	◯
Reklamların amacı tüketiciyi bilgilendirmektir	◯	◯	◯	◯	◯
Reklamların bilgilendirici olduğuna inanırım	◯	◯	◯	◯	◯
Reklamlar çoğunlukla doğrudur	◯	◯	◯	◯	◯
Reklamlar bir ürünün kalitesi ve performansı ile ilgili güvenilir bilgi kaynaklarıdır	◯	◯	◯	◯	◯
Reklam, gerçeğin güzel bir şekilde anlatılmasıdır	◯	◯	◯	◯	◯
Genel olarak bakıldığında bir reklam, reklamı yapılan ürün ile ilgili doğru bir imaj çizer	◯	◯	◯	◯	◯
Çoğu reklamı izledikten sonra doğru bir şekilde bilgilendirildiğimi hissederim	◯	◯	◯	◯	◯
Çoğu reklam tüketiciye ürün ile ilgili mutlaka bilinmesi gereken bilgileri sunar	◯	◯	◯	◯	◯

2. Aşağıdaki cümleler sizin fikrinizi ne derece yansıtır?

	Kesinlikle Katılmıyorum	Katılmıyorum	Ne Katılıyorum, Ne Katılmıyorum	Katılıyorum	Kesinlikle Katılıyorum
Reklam gerekli bir şeydir	◯	◯	◯	◯	◯
Reklamları izlemeyi severim	◯	◯	◯	◯	◯
Reklamlar bizi materyalist bir toplum olmaya iter	◯	◯	◯	◯	◯
Reklamlar insanları hayal dünyasında yaşamaya iter	◯	◯	◯	◯	◯
Reklamlar insanlara gösteriş için alım güçlerinin olmadığı ürünler aldırır	◯	◯	◯	◯	◯
Reklamlar yüzünden insanlar ihtiyaçları olmayan birçok şey satın alır	◯	◯	◯	◯	◯
Reklamlar bana kendi hayat tarzıma yakın insanların ne gibi ürünler satın alıp kullandıkları hakkında bilgi verir	◯	◯	◯	◯	◯
Reklamlar hayat standartlarımızı artırmaya yardımcı olur	◯	◯	◯	◯	◯
Reklamlar sayesinde toplum için daha iyi ürünler üretilir	◯	◯	◯	◯	◯

3. Bir televizyon reklamı ile karşılaştığınızda aşağıdaki davranışları hangi sıklıkla gerçekleştirirsiniz?

	Asla	Nadiren	Bazen	Sıklıkla	Her Zaman
Odadan Çıkarım	◯	◯	◯	◯	◯
Bir şeyler okurum (kitap, dergi, gazete, sosyal medya, internet vb.)	◯	◯	◯	◯	◯
Odadaki başka insanlar ile konuşurum	◯	◯	◯	◯	◯
Telefon ile konuşurum & mesajlaşırım	◯	◯	◯	◯	◯
Başka bir kanala geçerim	◯	◯	◯	◯	◯
Televizyonu kapatırım	◯	◯	◯	◯	◯
Televizyonun sesini kısarım	◯	◯	◯	◯	◯

* 4. Kişisel bilgisayarınızda reklam engelleme yazılımı kullanıyor musunuz?

- ◯ Hiç kullanmadım
- ◯ Daha önce kullandım, şimdi kullanmıyorum
- ◯ Evet kullanıyorum

* 5. Akıllı telefonunuzda reklam engelleme yazılımı kullanıyor musunuz?

- ◯ Hiç kullanmadım
- ◯ Daha önce kullandım, şimdi kullanmıyorum
- ◯ Evet kullanıyorum

* 6. Reklam engelleme yazılımları hakkındaki düşünceleriniz nedir?

	Kesinlikle Katılmıyorum	Katılmıyorum	Kararsızım	Katılıyorum	Kesinlikle Katılıyorum
Reklam engelleme yazılımlarını başkalarına tavsiye ederim	◯	◯	◯	◯	◯
Reklam engelleme yazılımı kullanmak bir tüketici olarak hakkımdır	◯	◯	◯	◯	◯
Reklam engelleme yazılımları hayatımı kolaylaştırır	◯	◯	◯	◯	◯
Reklamları engellediğim zaman benim için önemli olabilecek bazı bilgilere erişimim kısıtlanır	◯	◯	◯	◯	◯

* 7. Reklam engelleme yazılımlarının kullanımına karşı tutumunuz nedir?

	Kesinlikle Katılmıyorum	Katılmıyorum	Kararsızım	Katılıyorum	Kesinlikle Katılıyorum
Reklam engelleme yazılımları tüketicilere ve topluma fayda sağlar	◯	◯	◯	◯	◯
Reklam engelleme yazılımları markalara maddi zarar vermektedir	◯	◯	◯	◯	◯
Reklam engelleme yazılımları gazete, dergi vb. mecralara maddi zarar vermektedir	◯	◯	◯	◯	◯
Reklam engelleme yazılımları kullanan tüketicilerin hayatını kolaylaştırır	◯	◯	◯	◯	◯

* 8. Kişisel eğilim olarak aşağıdaki maddelere ne derece katılmaktasınız?

	Kesinlikle Katılmıyorum	Katılmıyorum	Kararsızım	Katılıyorum	Kesinlikle Katılıyorum
Kendimden daha yüksek bir pozisyona sahip kişilerin isteklerini kolaylıkla kabul ederim	◯	◯	◯	◯	◯
Kendimden daha yetkili bir kişinin taleplerini reddetmek benim için zordur	◯	◯	◯	◯	◯
Emirleri soru sormadan yerine getirmeye yatkınımdır	◯	◯	◯	◯	◯
Otorite figürleri ile fikir ayrılığı yaşamayı zor bulurum	◯	◯	◯	◯	◯
Yüksek pozisyonlara sahip kişiler, düşük pozisyonlara sahip kişilere göre daha güçlüdür	◯	◯	◯	◯	◯

* 9. Cinsiyetiniz

- ◯ Kadın
- ◯ Erkek
- ◯ Diğer
- ◯ Belirtmek istemiyorum

* 10. Yaşınız

- ◯ 18-24
- ◯ 25-34
- ◯ 35-44
- ◯ 45-54
- ◯ 55-64
- ◯ 65 ve üstü

* 11. Eğitim Düzeyiniz

- ◯ İlkokul
- ◯ Lise
- ◯ Üniversite
- ◯ Yüksek Lisans
- ◯ Doktora

* 12. Aylık Kişisel Gelir Seviyeniz

- ◯ 0-2499TL
- ◯ 2500-4999TL
- ◯ 5000-7499TL
- ◯ 7500-9999TL
- ◯ 10000TL ve üstü

APPENDIX B: ETHICS BOARD APPROVAL

Ethics Board Approval is available in the printed version of this dissertation.