Underage Access to Online Alcohol Marketing Content: A YouTube Case Study

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(Received 3 July 2014; first review notified 23 August 2014; in revised form 7 September 2014; accepted 14 October 2014)

Abstract — Aims: With the proliferation of the Internet and online social media use, alcohol advertisers are now marketing their products through social media sites such as YouTube, Facebook and Twitter. As a result, new recommendations have been made by the Federal Trade Commission concerning the self-regulation of digital marketing strategies, including content management on social and digital media sites. The current study sought to determine whether alcohol companies were implementing the self-imposed mandates that they have developed for online marketing. Specifically, we examined whether alcohol companies were implementing effective strategies that would prevent persons under the minimum legal drinking age in the USA from accessing their content on YouTube. Methods: We assessed 16 alcohol brands (beer and liquor) associated with the highest prevalence of past 30 day underage alcohol consumption in the USA. Fictitious YouTube user profiles were created and assigned the ages of 14, 17 and 19. These profiles then attempted to access and view the brewer-sponsored YouTube channels for each of the 16 selected brands. Results: Every underage profile, regardless of age, was able to successfully subscribe to each of the 16 (100%) official YouTube channels. On average, two-thirds of the brands’ channels were successfully viewed (66.67%). Conclusion: Alcohol industry provided online marketing content is predominantly accessible to underage adolescents. Thus, brewers are not following some of the self-developed and self-imposed mandates for online advertising by failing to implement effective age-restriction measures (i.e. age gates).

INTRODUCTION

Alcohol is the most commonly used and abused substance in the USA, and is attributed to >4300 deaths among underage youth (Centers for Disease Control and Prevention, 2014). In 2010 alone, ~189,000 alcohol-related emergency room visits were reported for persons under the minimum legal drinking age (MLDA) of 21 (Abuse and Mental Health Services Administration, Center for Behavioral Health Statistics and Quality, 2012). Given that (a) ~70% of high school students have consumed alcohol, (b) more than half of all 12th graders have been drunk and (c) 22% of high school students engage in heavy episodic drinking (i.e. five or more drinks for men and four or more drinks per women in one occasion), it is not surprising that young inexperienced drinkers would experience secondary consequences stemming from their drinking (Bonnie and O’Connell, 2004; U.S. Department of Health and Human Services, 2007; Centers for Disease Control and Prevention, 2012; Johnston et al., 2013). In fact, youth who drink report more injuries, drinking and driving, and an increased rate of other risk behaviors, including risky sexual behaviors, violence and drug use (DiClemente et al., 2001; Romer, 2003). Approximately 10.4 million young people between the ages of 12–20 reported they drank alcohol beyond ‘just a few sips’ in the past month (Substance Abuse and Mental Health Services Administration, 2010). By age 15, >50% of teens have had at least one drink (U.S. Department of Health and Human Services, 2007). Thus, underage drinking clearly remains a significant public health concern (National Institute on Alcohol Abuse and Alcoholism, 2013).

Online alcohol marketing: a risk factor for drinking initiation

Exposure to alcohol marketing and advertising is identified as a contributing factor leading some young people to consume alcoholic beverages (Anderson et al., 2009; Smith and Foxcroft, 2009). Moreover, awareness of alcohol advertising is associated with favorable beliefs about drinking as well as intentions to drink as an adult (Grube and Wallack, 1994). With the proliferation of the Internet and online social media use, alcohol advertisers have augmented their marketing strategies to include online promotions. Some brands, such as Southern Comfort, have allocated their entire advertising budget to online marketing exclusively (Mullman, 2009; Straczyński, 2009). Based on data collected among 14 major alcohol companies, the Federal Trade Commission (FTC) documents a 4-fold increase in online marketing expenditures between 2008 and 2011, and a clear trend of reducing monies spent on traditional marketing while at the same time increasing expenditures on digital and online marketing (FTC, 2014). While it is clear that the industry is spending more on online marketing, Carstensen (n.d.) contends that quantification of alcohol advertisements on social media is difficult due to the manner in which alcohol posts, such as videos on YouTube, are circulated among users (i.e. sharing a ‘viral video’). The hope of the alcohol industry is that users actually become the distributor of advertising material and brand promotion as they share viral content with their online contacts. For instance, Youtube videos can easily be embedded within a user’s Facebook page or forwarded to friends. Additionally, alcohol advertisers are employing practices such as online social games, brand-specific blogs, Youtube microsites and social media contests (Chester et al., 2010).

Only a few studies have addressed the prevalence, nature and extent of alcohol marketing on social media (Brodmerkel and Carah, 2013). This lack of understanding is concerning considering young adolescents now spend more time with media than they do in school (Henry J. Kaiser Family Foundation, 2010). Media use has become the leading activity for children and teenagers other than sleeping (Henry J. Kaiser Family Foundation, 2010). Of teens using the Internet, 73% access social networking sites (Landry et al., 2013). Twenty-two percent of teenagers log onto their favorite social media site (e.g. Facebook, YouTube, Twitter) >10 times a day, and more than half of adolescents log onto a social media site more than once a day (Common Sense...
Media, 2009). Moreover, college students report viewing social network profiles an average of 2.4–4.19 times a day for an average of 1–2 and a half hours (Raacke and Bonds-Raacke, 2008; Moreno et al., 2009).

Since its launching in 2007, YouTube has become one of the most prolific social media sites. More than 1 billion unique users visit YouTube each month, and over 6 billion hours of videos are watched (YouTube, n.d.). Approximately 50% of teenagers cite YouTube as their favorite website, with 58% of Generation X (born between 1966 and 1976), 70% of Generation Y (Millennials, 1977–1994), and 83% of Generation Z (1995–2012) users visiting YouTube monthly (Smith, 2014).

Alcohol advertising has a positive effect on drinking among 15–26 years olds, such that as exposure to advertisements increases so too does alcohol consumption (Martin et al., 2002). Grube contends ‘alcohol advertising is attended to, remembered, and liked by children and adolescents’ (Martin et al., 2002, p. 905). Economic studies investigating the impact of alcohol advertising assert countries that have initiated alcohol advertising bans exhibit lower levels of (a) per capita alcohol consumption, (b) liver cirrhosis mortality rates and (c) motor vehicle fatality rates (Saffer, 1991). Given that teenagers with higher exposure to alcohol are more likely to think, it is okay for teens to drink when compared with peers with low alcohol advertising exposure (Kusserow, 1992; Stacy et al., 2004), policy makers and parents alike are concerned about the amount of advertising and marketing material to which young people are exposed.

Current investigation
Due to the ubiquity of emerging technologies and mediums, new recommendations have been made by the Federal Trade Commission concerning the self-regulation of digital marketing strategies, including content management on social media sites like Facebook, YouTube and Twitter, by alcohol companies (2014). Three alcohol industry trade associations have adopted regular advertising and marketing practices. Two of these associations have also developed advertising and marketing guidelines specifically for digital media. These guidelines that have been developed by the alcohol industry are outlined in Table 1 (2014).

The current study sought to determine whether alcohol companies were implementing the self-imposed mandates that they have developed for online marketing (see Table 1). Specifically, this investigation examined whether alcohol companies were implementing Mandate 2—preventing those under the MLDA from accessing their content on social media sites. We chose to examine whether three fictitious, underage users could access alcohol company developed/provided content on YouTube. YouTube was specifically selected, as opposed to company websites or other social media sites such as Facebook, for several reasons. First, in late 2012 YouTube adopted an Adult Verification System, known as an ‘Age Gate’ feature, which allows alcohol companies to only place ads in the search results of consumers who have previously registered with the service and indicated that they are at least 21 years of age. In effect, an age gate should block access to content that has been deemed unsuitable for underage users. However, a recent FTC study documented that not all companies that market on YouTube are using this age gate technology (FTC, 2014). Second, we were specifically interested in examining youth access to content delivered directly from alcohol marketers. With social media sites such as Facebook, users are exposed to user-generated content. Finally, it has previously been documented that alcohol industry websites all employ effective age gates which prevent underage access, assuming users report their actual age (FTC, 2014). Given that age gate technology is currently available and in use on alcohol company websites, we hypothesized that our underage users would not be able to access marketing content provided by the alcohol industry.

METHODS

Creation of fictitious user profiles
Researchers created fictitious Gmail user accounts linked to YouTube user profiles. Names were randomly selected by using the top ten boy names of 2012, and three most common surnames from the United States Social Security Administration and United States Census Bureau, respectively. Each of the three male profiles was randomly assigned an age of 14, 17 or 19. Researchers elected to use only male profiles since research indicates that the number of new teenage drinkers appears to be increasing, with heavy use being found among all age groups in males (National Research Council and Institute of Medicine, 2004). These ages were selected to mirror high school and college-aged populations not of legal drinking age in the USA. Profile birthdates were chosen to be the midpoint of their respective ages.

Search inclusion and exclusion factors
In order to determine which alcohol brands to include in our search criteria, we identified the top 25 alcohol brands used in the past 30 days by underage drinkers in the USA (Siegel

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<th>Guideline</th>
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<tr>
<td>DISCUS</td>
<td>Communication should be placed by only in media where 71.6 % of the audience is expected to be 21+.</td>
<td>For any page or website controlled by the brand, the company should require age verification before communicating with a visitor.</td>
<td>Brand advertisers must regularly monitor and moderate user-generated content on their pages.</td>
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<tr>
<td>BI CODE</td>
<td>Advertising placement in digital media is permissible where there is no dialogue between a brewer and user, and 71.6% of the audience is expected to be adults of legal drinking age.</td>
<td>Placement is only permissible only if the brewer confirms the user is of legal drinking age either by asking the user to enter his or her birthday.</td>
<td>Brewer must monitor user-generated content on a regular basis and remove any content that does not comply with the code.</td>
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et al., 2013). Commonly consumed brands among underage youth included Bud Light (30%), Smirnoff malt beverages (17%) and Budweiser (15%) (Siegel et al., 2013). Of the 25 brands identified, we selected 16 alcohol brands from the list consisting of only beer or liquor products. These 16 alcohol brands constituted the specific search terms used. Given that underage alcohol consumption is concentrated among a relatively small number of alcohol brands (Siegel et al., 2013), it is important to note that the brands we examined were those associated with the highest prevalence of past 30-day consumption among underage youth (i.e. Bud Light, Smirnoff, Coors Lite, Captain Morgan).

Measures of access
A total of three researchers began gathering data by each accessing the website www.youtube.com. This website maintains its own search engine for finding videos within its domain. This search bar is where researchers typed in each of the 16 brands (i.e. ‘Bud Light’). Once researchers found the official page, referred to as a ‘channel’ on YouTube, for each respective brand they clicked on the link to that YouTube channel. Within each channel, the videos available are posted only by the company sponsoring the channel (as opposed to videos posted by any number of other YouTube users). When visiting a YouTube channel, viewers are given the option to ‘subscribe’ to the channel, which will result in populating your feed with videos posted by your subscribed channels. Researchers made an effort to access and enter each channel for the 16 brands of alcohol and, if access was granted, subsequently subscribe to the channel.

Upon logging into YouTube, viewers are directed to a ‘home page’ that is tailored to the material posted by the channels specifically subscribed to. The two headings under which the home page videos are organized are ‘What to Watch’ and ‘My Subscriptions.’ Both of these are regularly updated feeds by the respective manager of the subscribed channels. As a rule, researchers first attempted to access each channel’s videos listed under the default ‘What to Watch’ navigational tab. Of available videos recommended by each channel, an attempt was made to access video content, first under ‘What to Watch’ and then under ‘My Subscriptions’, until at least four videos could be viewed. While viewing the ‘What to Watch’ page, a maximum of five, with a minimum of one, video(s) per channel are visible at once. On average, 3.8 videos were posted by each brand and were visible at one time. Therefore, four videos were chosen as the cutoff for successful accessibility. If four videos were viewed, the attempt was deemed successful. If four videos could not be viewed under the ‘What to Watch’ and ‘My Subscriptions’ tabs, the attempt was deemed unsuccessful. Dichotomous results (success/no success) were recorded in an Excel spreadsheet.

RESULTS
Each of the three underage profiles was able to successfully subscribe to all 16 (100%) official YouTube channels. On average, two-thirds of the brands’ channels were successfully viewed (66.67%). Of the videos successfully accessed, 50% were through the ‘What to Watch’ tab and 50% were through the ‘My Subscriptions’ tab.

Profile 1 (see Fig. 1) belonged to a male aged 14. Of the total 16 brands’ channels, Profile 1 had access to 10 (63%). Of the 10 accessible channels, 5 were found under ‘What to Watch’ and 5 were found under ‘My Subscriptions’. Profile 2 belonged to a male aged 17. Of the total 16 brands’ channels, Profile 2 (see Fig. 2) had access to 11 (69%). Of the 11 accessible channels, 6 were found under ‘What to Watch’ and 5 were found under ‘My Subscriptions’. Profile 3 belonged to a male aged 19. Of the total 16 brands’ channels, Profile 3 (see Fig. 3) had access to 11 (69%). Of the 11 accessible channels, 5 were found under ‘What to Watch’ and 6 were found under ‘My Subscriptions’.

DISCUSSION
To our knowledge, this is the first study attempting to describe the accessibility of alcohol content on YouTube to underage persons in the USA. Based on our findings, it is clear that alcohol industry provided YouTube content is predominantly accessible to underage adolescents. This result is surprising given that age gate technology is currently available on YouTube and employed on the respective websites of alcohol marketers (FTC, 2014). Thus, brewers are not staying true to some of the self-developed and self-imposed mandates for online advertising by failing to implement effective age-restriction measures. This is concerning considering the growing body of scholarly literature indicating a positive association between youth drinking behaviors and exposure to alcohol advertising (Austin and Knaus, 2000; Collins et al., 2003; Unger et al., 2003). Overall, underage drinkers in this investigation, one of which was as young as 14, were able to easily access alcohol-related brand channels and brand-specific alcohol content.

In sum, underage adolescents with greater exposure to alcohol marketing, including online media, are more likely to start drinking than their unexposed peers (Snyder et al., 2006; Jernigan, 2008). Data from youth drinking surveys estimate a 28% reduction in alcohol advertising would reduce the percentage of adolescents who drank in the last month by 4–16% (Jernigan, 2008). In 2003, the Center on Alcohol Marketing and Youth reported that for every ad referring to the legal drinking age, there were 179 product ads aimed at underage drinking (Bonnie and O’Connell, 2004). Some contend that these promotions, some of which are housed within a ‘responsible drinking’ guise, may actually provide dissonant individuals (i.e. those feeling anxiety about one’s drinking behaviors) alleviation through consistent exposure to visual imagery employed in these advertisements (Barry, 2007). Of the total annual consumer expenditures on alcohol, economic estimates attribute $22.5 billion (17.5% of all expenditures) to underage consumers (Foster et al., 2006).

LIMITATIONS
This study was limited to investigating access to only one social media site, YouTube. Investigating other social media sites frequented by underage individuals, such as Facebook and Twitter, would help to expand the body of knowledge about which companies implement the ‘Age Gate’. Furthermore, cell phone access was not attempted in our study. Since a large percentage of youth between the ages of 12 and 17 access the
Fig. 1. Access for 14-year-old profile.

Fig. 2. Access for 17-year-old profile.
Internet using their cell phones, including this aspect in further research is warranted. Additionally, this investigation focused exclusively on whether or not underage persons could access alcohol industry promotions. Thus, we did not assess the content that was accessed (i.e. thematic analysis, etc.). Future research should expand on our work by examining the themes commonly found in material that is accessible to underage youth.

CONCLUSION

Approximately 30% of youth begin drinking before age 13 (Centers for Disease Control and Prevention, 2004). Adolescent drinking has the potential to profoundly affect future life trajectories and later outcomes, including problems with drugs and antisocial behaviors (Kruger et al., 2002; Guttmannova et al., 2011). Use at an early age can also increase the odds of adult alcohol abuse and dependence and the earlier the age at which young people take their first drink of alcohol, the greater the risk of abusive consumption and development of serious problems, including alcohol disorders (Chou and Pickering, 1992; Gruber et al., 1996; Hawkins, 1997; Grant et al., 2001). Young people’s brains keep developing well into their mid-20s and alcohol consumption prior to, and during this time, can alter brain development, potentially affecting both brain structure and function (i.e. thinking, memory and learning) (U.S Department of Health and Human Services, 2006; Guttmannova, et al., 2011; National Institute on Alcohol Abuse and Alcoholism, n.d.). Brain imaging research asserts that teens with alcohol use disorders show greater activity in areas of the brain previously linked to reward, desire, positive affect, and episodic recall in response to alcoholic beverage advertisements, with the highest degree of brain response in youth who consume more drinks per month and report greater desires to drink. This suggests that alcohol advertising has a particular effect on youth who are already heavy drinkers (Tapert et al., 2003). Thus, restricting young adolescents’ exposure to alcohol advertising represents an important public health objective.

Conflict of interest statement. None declared.

REFERENCES


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