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Alcoholposts on Social Networking Sites: The Alcoholpost-Typology

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Abstract

Young people frequently display alcohol-related posts (''alcoholposts'') on social networking sites such as Facebook and Instagram. Although evidence exists that such posts may be linked with increases in alcohol consumption, hardly any studies have focused on the content of such posts. This study addresses this gap by applying and extending the alcoholpost-typology previously proposed by Hendriks, Gebhardt, and van den Putte. A content analysis assessed the extent to which alcoholposts were displayed on Facebook and/or Instagram profiles of young participants (12–30 years; $N = 192$), and which type of alcoholpost these posts most strongly resembled. Moderate alcoholposts (e.g., in which alcohol was in the background) were most often posted. At times, textual alcoholposts and commercial alcoholposts were also displayed; however, extreme posts (e.g., about drunk people or drinking-games) were almost nonexistent. These findings confirm the previous results by Hendriks et al. that moderate posts are more frequently posted than extreme posts. This could imply that positive associations with alcohol consumption are more visible on social media than negative associations, potentially leading to an underestimation of alcohol-related risks.

Keywords: social networking sites, alcoholposts, alcoholpost-typology

Introduction

ALTHOUGH ALCOHOL USE and binge drinking have been consistently linked with adverse consequences,[1] many young people regularly engage in these behaviors.[2] For example, Hibell et al.[3] showed that 43 percent of college students engaged in binge drinking at least once a month (for similar findings, see Refs.[4,5]). On social networking sites, such as Facebook and Instagram, this pervasiveness of alcohol consumption is becoming increasingly apparent. That is, recent studies have shown that young people frequently display alcohol-related posts (''alcoholposts'') on social media, with percentages of people posting alcoholposts varying from 36 to 96 percent.[6–8] Recent evidence suggests that posting alcoholposts has become part of young peoples' daily social lives[9] and is integrated in young peoples' drinking cultures.[10]

Alcoholposts on social media have been related to actual drinking behaviors. For example, Boyle et al.[11] showed that when young people posted more alcoholposts on social networking sites, this led to increased alcohol consumption 6 months later (for similar findings, see Ref.[12]). Furthermore,

the ''Neknomination Challenge'' (i.e., alcoholposts in which young people challenge each other to drink a lot), which took place in 2014 on Facebook, was related to several alcohol-related deaths according to media reports.[13] Given these potentially severe negative consequences of alcoholposts, it is important to understand the exact content of what people are posting. Unfortunately, almost no previous research provides in-depth knowledge about the content of alcoholposts. This study addresses this gap by applying and extending the alcoholpost-typology (APT) proposed by Hendriks et al.[14]

Content of alcoholposts

Some studies have tried to distinguish between posts focused on ''normal'' alcohol use and those focused on ''intoxication.''[5–8,15] However, more in-depth knowledge about what type of alcoholposts are often placed is not readily available. A recent exception is a study by Hendriks et al.[14] who distinguished between four types of alcoholposts. That is, based on pilot studies, they asked to what extent young people posted (1) posts in which alcohol is ''accidently'' in

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the image, for example, a photo of a dinner or party in which alcoholic beverages are on the table (*alcohol-in-background post*); (2) posts in which alcohol is the focus of the post, for example, a close-up of a beer on a beach (*alcohol focus post*); (3) posts in which someone is shown who is intoxicated or drunk (*drunken post*); and (4) posts in which drinking-games are displayed (*drinking-game post*). This study revealed that young people say they mainly post more moderate posts (such as post 1 and to a lesser degree post 2) and do not post more extreme posts (such as posts 3 and 4). This suggests that the more positive sides or alcohol consumption (e.g., having fun at a party) is often shown online, but the more negative sides (e.g., vomiting or getting hurt) are less often displayed. This could potentially lead to an underestimation of the risks of alcohol consumption.

This study aims to apply and extend the findings of the study by Hendriks et al.[14] that was based on questionnaire data, by doing a content analysis of profiles on Facebook and Instagram. Moreover, to test a more complete typology of alcoholposts, two more types were tested. That is, given recent studies on the presence of alcohol advertisements on social media,[16,17] we tested to what extent young people displayed (post 5) commercialized alcoholposts, such as a post by Heineken (*commercial post*). Furthermore, to examine whether alcoholposts are mainly pictures or texts,[15] we also tested the extent to which (post 6) written posts about the consequences of alcohol use were displayed (*textual post*). For an overview of these six types, see Table 1.

Materials and Methods

Participants and design

This study was part of a larger data collection in which 561 participants (who were approached by the research company *I&O Research*) completed a survey. These participants were asked whether we could also access their Instagram and Facebook profiles (i.e., the most popular social networking sites among adolescents and young adults[18]). In total, 192 participants agreed to give access to their profiles and were analyzed in this study ($M_{age} = 20.64$, $SD_{age} = 4.68$, 132 women and 54 men[a]). All participants ($N = 192$) were high school students ($n = 55$) or college students ($n = 137$) in Netherlands and had a Facebook profile ($n = 176$) and/or an Instagram profile ($n = 85$).

Procedure

By accepting a friend request by a research profile on Facebook and/or Instagram, participants provided the researchers access to all their posts. Participants were informed that all personal information would be removed or obscured from the posts. Screenshots were made of all profiles for the period of 1 year (i.e., April 2015–April 2016). For participants <18 years, consent was asked of the parents as well as the participants themselves. The university's ethics committee approved this study.

Content analysis

Codebook development and procedure. Coders were trained in three sessions guided by the first author, during which example profiles were coded and inconsistencies and problems were discussed. After this, all profiles were coded.

During the coding process, coders coded 10 percent of the same profiles (5 percent at the start of the coding process and 5 percent at the end to reduce coder drift) to assess coder reliability (i.e., $\alpha = 0.63–0.99$[b]). When coders were unsure how to code a post, this was discussed with the first author after which a choice for coding was made.

Coding variables

Occurrence and frequency. Coders needed to code the profiles by scrolling through the screenshotted timelines and by looking at each post. An alcoholpost was defined as "a post about alcohol, or in which alcohol is visible." Coders coded whether there was an alcoholpost visible on the profile (i.e., occurrence: no/yes), and if so, how many they identified (i.e., frequency). If at least one alcoholpost was identified, the coder was instructed to code for each post the type of post.

Type of alcoholpost. Coders had to indicate whether the alcoholpost resembled one of six categories. This typology was an extended version on the typology by Hendriks et al.[14] and described six types of alcoholposts by showing a typical example of such a post, including an explanation, see Table 1.

Results

Occurrence and frequency of alcoholposts

On Facebook ($n = 176$), 90 participants had at least one alcoholpost on their profile (51 percent). On Instagram ($n = 85$), this was 28 percent (24 participants). Of those participants who had at least one alcoholpost on their profile, the average number of alcoholposts was five on Facebook ($M = 5.02$, $SD = 6.32$) and four on Instagram ($M = 3.91$, $SD = 4.21$). To analyze the types of alcoholposts, we studied all alcoholposts that were found on Facebook ($n = 442$) and Instagram ($n = 94$).

Type of alcoholposts

On Facebook, most alcoholposts ($n = 275$, 62.2 percent) resembled the *alcohol-in-background* post. The *alcohol-focus* post was to a lesser degree also common ($n = 113$, 25.6 percent). No one posted a *drunken* post ($n = 0$, 0 percent) and almost no one ($n = 2$, 0.5 percent) posted about *drinking-games*. The newly tested posts, that is, *textual* posts ($n = 32$, 7.2 percent) and *commercial* posts ($n = 20$, 4.5 percent), were displayed more often than the *drinking-game* and *drunken* posts, but less often than the *alcohol-in-background* and *alcohol-focus* posts.

Similarly, on Instagram, the *alcohol-in-background* and *alcohol-focus* posts were also posted most frequently. However, in contrast with Facebook in which the *alcohol-in-background* posts were more often displayed than the *alcohol-focus* posts, on Instagram, the *alcohol-in-background* ($n = 43$, 45.7 percent) and *alcohol-focus* ($n = 46$, 48.9 percent) were posted almost as often. Furthermore, five *textual* posts were found ($n = 5$, 5.3 percent). *Drunken* posts, *drinking-game* posts, or *commercial* posts were not found on Instagram ($n = 0$, 0 percent) (see also Table 2).

TABLE 1. THE SIX TYPES OF ALCOHOLPOSTS AND DESCRIPTIONS

Alcoholpost 1(alcohol-in-background)	*Alcoholpost 2*(alcohol-focus)	*Alcoholpost 3*(drunken)	*Alcoholpost 4*(drinking-game)	*Alcoholpost 5*(commercial)	*Alcoholpost 6*(textual)
Alcoholpost 1: A photo or video in which alcohol is in the image by chance because you or others **hold or drink alcoholic drinks** (e.g., during a dinner or party). This photo is an example of such a post.	Alcoholpost 2: A photo, video, or text in which **an alcoholic drink is the focus** of the post. Think about, for example, a photo in which a beer fills up most of the image, or a post that is clearly centered around a bottle of whisky. This photo is an example of such a post.	Alcoholpost 3: A photo or video in which you or others **are very intoxicated or drunk.** This photo is an example of such a post.	Alcoholpost 4: A photo, video, or text that refers to a **drinking-game.** This can be an online game or challenge (e.g., the Neknomination-challenge), or a "regular" board- or card-game in which the goal is to drink (a lot of) alcohol. This photo is an example of such a post.	Alcoholpost 5: A **commercial** photo, video, or text that refers to alcohol-related brands or products. An example is when someone shares a Heineken commercial. This photo is an example of such a post.	Alcoholpost 6: A **text** or caption that refers to the consequences of drinking alcohol (positive [such as having fun] or negative [such as having a hangover]). These photos are examples of such posts. Translation: *Drinking beers on the terrace! Fun!* and *Aarg, fat hangover. Drank too much yesterday.*

465

TABLE 2. FREQUENCIES AND PERCENTAGES
OF THE SIX TYPES OF ALCOHOLPOSTS FOUND
ON FACEBOOK ($N=442$) AND INSTAGRAM ($N=94$)

	Facebook		Instagram	
	n	%	n	%
Alcoholpost 1 (alcohol-in-background)	275	62.2	43	45.7
Alcoholpost 2 (alcohol focus)	113	25.6	46	48.9
Alcoholpost 3 (drunken)	0	0.0	0	0.0
Alcoholpost 4 (drinking-game)	2	0.5	0	0.0
Alcoholpost 5 (commercial)	20	4.5	0	0.0
Alcoholpost 6 (textual)	32	7.2	5	5.5

Discussion

The purpose of this article was to shed light on the content of alcoholposts on social media. Based on the APT developed by Hendriks et al.,[14] we tested six types of alcoholposts by conducting a content analysis of alcoholposts on Facebook and Instagram. Findings revealed (1) that moderate posts are more commonly posted than more extreme alcoholposts, (2) that commercial posts are displayed, but not often, and (3) that alcoholposts are mostly visual (i.e., pictures) instead of verbal (i.e., texts).

First, the results revealed that moderate posts (i.e., posts of dinners or parties in which alcoholic beverages appear in the background; or posts that zoom in on an alcoholic drink such as a picture of a beer on the beach) are more often displayed than more extreme posts (i.e., posts depicting intoxicated or drunk people; or posts showing drinking-games). This finding based on actual posting behavior provides further support for the typology developed by Hendriks et al.,[14] which was previously based on questionnaire data alone. This result may hold important implications, because this suggests that young people mainly post about social situations in which alcohol is part of the fun (e.g., having fun at a party), but not about the situations in which alcohol has negative consequences (e.g., vomiting or getting hurt). By repeatedly showing alcohol together with positive consequences, this creates a stronger association between these two concepts, making the combination "alcohol is fun" more accessible in memory.[19] Because accessible concepts are stronger predictors of behavior,[20] this may consequently result in more alcohol use (e.g., in line with Ref.[11,12]). Future research is needed to investigate the role that alcoholposts play in creating alcohol-related associations and to develop and test potential e-Health interventions to address such associations and reduce alcohol intake.[21]

Second, because some studies[16,22] have suggested that alcohol brands frequently use social media to advertise, we examined commercial alcoholposts as an additional type of alcoholpost. Although these posts were indeed displayed on Facebook (i.e., ∼5 percent of the alcoholposts), they were displayed far less often than the moderate posts showing personal experiences. This relatively low percentage seems somewhat in contrast with the study by Jernigan et al.,[23] which showed that 40 percent of young people were exposed to commercial alcoholposts and that 10 percent interacted with such brand-related content on social media. A plausible explanation for these differences is that we focused on the posts that were actually shared by participants on their profiles. However, the results of Jernigan et al.[23] suggest that commercial messages often originate from brands themselves, for example, through paid advertisements that Facebook shows alongside people's timeline. In addition, people can like an alcohol brand and consequently receive updates from this brand. Given our focus on user-generated content, both forms of exposure were not taken into account in our study. Furthermore, because our sample size was limited, it is necessary to replicate our findings with a larger sample to draw conclusions with more certainty. Future research should thus aim to establish a more complete account of young people's exposure to and interaction with commercial alcoholposts.

Third, although textual alcohol-related status updates were displayed on Facebook (i.e., ∼7 percent of the alcoholposts), our findings show that most alcoholposts consisted of pictures instead of solely texts. This is in line with Beullens and Schepers[6] who showed that alcohol-related texts on Facebook among Belgium youth were less common than alcohol-related pictures. However, other studies conducted in the United States on platform MySpace[15] showed that more than half of the alcoholposts were text based. This difference may be due to the different platforms or time periods, but may also be due to the different countries (as also argued by Refs.[6,24]). Whether alcoholposts are mainly texts or pictures potentially holds relevant implications for the precise content of the posts and subsequent effects. If alcoholposts are mostly text based, it is possible that consequences related to alcohol are more frequently displayed (e.g., "Partied it up to the fullest, but missed my first class due to a massive hangover"[23]) and when alcoholposts are mostly pictures, it is more likely that a social context is shown (e.g., groups of people having fun at a party while drinking[9]). These differences in terms of consequences and social contexts may lead into different effects of alcoholposts. Future research should explore this issue.

To conclude, this study sheds light on the content of alcoholposts. Specifically, we found that moderate alcoholposts are more commonly posted than extreme alcoholposts. Furthermore, although commercial and textual alcoholposts are sometimes displayed, it seems that alcoholposts most often illustrate personal experiences in pictures.

Notes

a. Owing to technical issues, six participants could not be linked to their questionnaire data providing demographics. Their profiles could be coded and are, therefore, included in the analyses.
b. We could not calculate agreement for variables with a low n (e.g., Instagram posts and drunken posts).

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