Framing on Facebook: Examining an Issues Management Approach to Obesity

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Abstract

This study utilized a quantitative content analysis to examine how ten major food corporations are managing and framing the obesity issue on Facebook. Despite the potential for communicating about issues with large numbers of active stakeholders on social media, corporations in our study are not maximizing their issues management efforts on this medium. This study reveals that the overall strategy used by these corporations involves providing individual-focused information about living healthy lifestyles. Food corporations are taking a very positive and empower-

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ing approach to the issue by refraining from using the term "obesity" in their messages and frames, providing personalized information related to empowering a healthy lifestyle, and using the product nutrition frame, all of which were found to be the more effective tactics in generating dialogue and positive reaction from stakeholders.

Obesity is a prevalent health concern in the United States. Research conducted by the Centers for Disease Control and Prevention indicates that adult obesity is common, with about one-third of all U.S. adults considered obese ("Adult Obesity, 2015"). According to a 2011-2012 survey, about 34% of men and 36% of women were obese (Ogden, Carroll, Kit, & Flegal, 2014). The magnitude of the obesity issue is increased by research that links it with other chronic conditions such as diabetes, gallstones, hypertension, heart disease, hyperlipidemia, stroke and some forms of cancer (Stein & Colditz, 2004; Thorpe, Florence, Howard, & Joski, 2004). As a result, many food corporations have been criticized for contributing to and augmenting what has been labeled as an obesity crisis (Diem, 2015).

Several corporations have responded to these environmental concerns by attempting to manage the obesity issue with framing messages on various media outlets (Darmon, Fitzpatrick, & Bronstein, 2008). Though traditional media outlets are an important stakeholder group that can play an influential role in framing environmental perceptions of issues (Heath & Palenchar, 2009), the advent of social media has opened up opportunities for corporations to communicate directly to stakeholders (Perry,

Taylor, & Doerfel, 2003). As a result, corporations must monitor and manage issues on social media as well.

A broad goal of this research is to understand how food corporations are using social media, especially Facebook, in their issues management efforts to frame the obesity issue. This study identifies the frames that are frequently used on social media and evaluates which of these frames stimulate dialogue and positive reactions from stakeholders. Lastly, this study also identifies the frames that lead to increased two-way communication or sharing of the corporation's message with others.

Literature Review
Obesity Issues and Issues Management

The obesity issue has become increasingly prevalent since it was first deemed a public health issue by the National Institutes of Health over 26 years ago (Lawrence, 2004). In 1990, the National Center for Health Statistics confirmed that the number of overweight Americans had officially exceeded the number of Americans who were not overweight. That same year, the issue started to attract media coverage, as the number of *New York Times* articles published about obesity increased by 50 percent (Lawrence, 2004). By 2001, lawsuits began to surface that placed food corporations under increased scrutiny for their alleged influence in the growing obesity figures (Lawrence, 2004).

The rapid emergence of the obesity issue has become highly controversial for the food industry, as many food corporations are now facing criticism from their stakeholders (Diem, 2015). Stakeholders in this study refer to "any group or individual (such as consumers, stock-

holders, government agencies, activists, media, etc.) who can affect or is affected by the achievement of the organization's objectives" (Freeman, 1984, p. 46).

Food corporations that fail to communicate their actions and involvement in the obesity issue to their stakeholders are faced with negative public attention and threats of organizational crises. Thus, practitioners in the food industry must capitalize on opportunities to engage in two-way communication with stakeholders in the pre-crisis stage, before the issue escalates.

An organizational issue is a topic or situation that can cause concern among stakeholders (Dougall, 2008) and have a negative impact on an organization's reputation (Coombs, 2007). Organizations must respond to environmental concerns with formal issues management strategies that involve identifying stakeholder concerns and perceptions of the issue and utilizing dialogue and collaboration to reach mutual understanding between the involved parties. Jiang and Bowen (2011) argued that the fundamental goals of issues management are to confront "conflicting value systems among publics," define organizational issues, and manage them with the use of internal and external communication (p. 1).

Organizational issues often escalate as a result of increased pressure from stakeholder groups (Coombs, 2010; Hainsworth & Meng, 1988; Mahon & Waddock, 1992; Regester & Larkin, 2008). By conducting dialogue with the public, organizations proactively influence how the issue is resolved in its early stages (Coombs, 2007), which allows them to become discussants in a collaborative public policy process (Heath, 1990). These efforts often result in the establishment of public policies that are mu-

tually advantageous for both the organizations and their publics (Heath & Palenchar, 2009).

Typical issues management strategies used by organizations involve sharing issue-relevant information with stakeholders to aid in mutual understanding (Hainsworth & Meng, 1988) and showing initiative by developing and proposing solutions to the problem (Jones & Chase, 1979). Thus, two important aspects of issues management – information sharing (Hainsworth & Meng, 1988; Jones & Chase, 1979) and providing solutions for the issue (Jones & Chase, 1979) – should be incorporated into an organization's issues management efforts. Another strategy used by the food industry to combat the obesity issue is collaborating with government, schools and/or the medical community to develop campaigns that educate the public about healthier eating options (Verduin, Agarwal, & Waltman, 2005).

Communication on Social Media Outlets

Online communication strategies often differ from traditional strategies since online media are more conducive to two-way communication (Perry et al., 2003; Sung & Kim, 2014; Sweetser, 2010). Since the beginning of the 21st century, new communication technologies have transformed stakeholders into more active groups and created additional opportunities for public issues to escalate (Hearit, 1999). Information has a higher potential to become viral as interactive features become more available to stakeholders and the ease of sharing via online media increases (Sweetser, 2010). Furthermore, unlimited accessibility to these technologies has given stakeholders an increased sense of empowerment to voice their opinions

about issues, which forces corporations to proactively address them before rumors spread and dominate the online conversation (Gonzalez-Herrero & Smith, 2008).

Other researchers have identified effective strategies for responding to stakeholders on social media. For example, use of a conversational, personal voice in online communication is important for maintaining relationships with stakeholders (Kelleher & Miller, 2006; Sweetser, 2010). Similarly, Gonzalez-Herrero and Smith (2008) suggested that corporations should adjust the tone and language of their online communication and utilize frequent and transparent responses. These researchers warned that the "very tools that trigger or enable crises can also provide solutions to resolving them" (p. 152).

According to Perry et al. (2003), online platforms afford opportunities to increase two-way communication by encouraging stakeholders to participate in dialogue, voice their concerns and ask questions. Kim, Kim, & Sung (2014) found that stakeholders were more apt to *like* personalized messages and provide comments to messages that request stakeholder feedback on Facebook. Sweetser (2010) found the use of videos to be an effective interactivity component in online interactions with stakeholders due to their abilities to provide opportunities for stakeholder feedback and effectively communicate the company's personality.

The use of interactive features on social media is mixed among many for-profit and nonprofit organizations. For example, some organizations take advantage of the interactivity components available on social media and other online platforms (Sweetser, 2010, Perry et al., 2003; Kim et al., 2014) while some do not (McCorkindale, 2010;

Waters, Burnett, Lamm, & Lucas, 2009). Macnamara (2010) found that many practitioners are using social media to obtain and evaluate information from stakeholders, but only a small percentage report two-way communication as their primary use for social media. This lack of usage is also attributed to the fact that many companies are unaware of how social media use coincides with their overall business strategy, which, in turn, makes defining the objectives for social media usage difficult (McCorkindale, 2010; Macnamara, 2010).

The aforementioned challenges further support the importance of this research. By studying how food corporations use social media to manage the obesity issue, practitioners can use this study as a benchmark for incorporating social media into their issues management efforts. Taking this into consideration, this study asks the following research questions:

> **RQ1a:** What kinds of issues management efforts do food corporations adopt when managing the obesity issue on Facebook (e.g., information sharing or providing solutions for the obesity issue)?
>
> **RQ1b:** Are there any differences among issues management efforts in terms of stakeholders' dialogue participation, positive reaction, and willingness to share messages with others on Facebook?
>
> **RQ2a:** What social media interactivity tactics are food corporations using to increase two-way communication with stakeholders on Facebook?
>
> **RQ2b:** Are there any differences among interactivity tactics adopted on Facebook in terms of stakeholders' dialogue participation, positive reaction, and willingness to share messages with others?

Framing the Obesity Issue

In addition to examining how food corporations are addressing the obesity issue, this study will identify the relevant frames commonly used by food corporations on social media. Framing is defined as "the process by which people develop a particular conceptualization of an issue or reorient their thinking about an issue" (Chong & Druckman, 2007, p. 104). For instance, tobacco advertisings often frame smoking behaviors as glamorous by featuring sexy models to promote the sales of tobacco products (Freeman & Chapman, 2007). Previous research has also suggested that mass media tend to frame the obesity issue as 'individual problems' rather than systematic, societal, and economic problems (Lawrence, 2004). Framing also influences the psychological processes that stakeholders use to understand the world around them, which, in turn, provides public relations practitioners with the ability to influence the ways in which stakeholders construct realities around various issues (Hallahan, 1999). As such, framing is a tool that can be used for promoting products/brands and effective issues management by selecting, emphasizing, and omitting specific information to make certain reality more salient, and is of importance to the purpose of this study.

Lawrence (2004) claimed there are competing frames about obesity that exist within society. She argued that obesity, like other health issues, is often framed by attribution of responsibility for its cause and resolution. Zieff and Veri (2009) claimed, "the obesity discourse has been framed using sensationalist adjectives such as crisis, epidemic, pandemic and war; these terms are often used inaccurately, serving to heighten the emotional, rather

than scientific tone of the content" (p. 155). For instance, television programs and shows, like Nickelodeon network's partnerships in promoting the "Go Healthy Challenge," the Kid Fitness program and "Shaq's Big Challenge" (Zieff & Veri, 2009), have attempted to frame the issue as the "fight against obesity."

To combat the frames that attribute responsibility and create negative perceptions of their organization's involvement, practitioners in the food industry should be proactive about framing the issue and their involvement on media platforms, like social media, in which there are no gatekeepers. Darmon et al. (2008) studied obesity issue frames prevalent in traditional media by examining Kraft, one of the major food corporations. They identified five major themes that Kraft used to manage the obesity issue: (1) Global Initiatives to Help Address the Rise in Obesity, (2) Product Nutrition, (3) Marketing Practices, (4) Consumer Information, and (5) Advocacy and Dialogue (see Table 1 for descriptions of each frame).

Among these five frames, the Product Nutrition frame was most commonly used in traditional media, followed by the Marketing Practices frame and the Global Initiatives frame (Darmon et al., 2008). Based on the frequencies of these frames in the media, these were seemingly the most interesting, important and/or newsworthy frames used in traditional media. Using the following research questions, this study will attempt to determine whether the frames being frequently used in traditional media (based on Darmon et al.'s 2008 research), are used in social media messaging as well:

> **RQ3a:** How are food corporations framing the obesity issue on Facebook?

RQ3b: Are there any differences among obesity issues frames used by food corporations in terms of stakeholders' dialogue participation, positive reaction, and willingness to share messages with others on Facebook?

Method
Sampling Procedure

Through the use of a quantitative content analysis methodology, this study examined corporations in the food consumer products industry from the *Fortune* 500 companies list. Data were retrieved from Facebook wall posts for the 2012 calendar year. Out of 14 corporations in the food consumer products industry ranked in the *Fortune* 500, nine had a corporate or general (non-campaign or non-product specific) Facebook page. Out of the nine corporations that had an official corporate Facebook, three *Fortune* 500 parent corporations (Kraft Foods, Kellogg and PepsiCo) were selected because these companies were considered the most prominent corporations in the food consumer products industry. The final sample included Facebook messages from three parent companies' Facebook pages (Kraft Foods, Kellogg and PepsiCo) and seven brand Facebook pages of the three parent companies (Jell-O, Crystal Light, Special K, Frosted Flakes, Quaker, Gatorade and Tropicana). Facebook messages considered for this study included official corporate wall posts and corporate comments posted in response to a stakeholder's post. A total of 14,401 Facebook messages during the one-year period were retrieved manually from these sites.

To investigate how often food corporations are addressing the obesity issue in comparison to overall number

of messages, messages addressing the obesity issue were identified using obesity issue-related keywords identified in previous research. The keywords included "obesity," "nutrition," "health," "lifestyle," "weight," "portion(s)," "whole-grain," staying in shape (including "active," "fit," "sports"),"low calorie," "unsalted," "no trans-fat," and "cholesterol-free" when addressing the obesity issue (e.g., Verduin et al., 2005). Other keywords were flagged based on emergent coding and by their mention in news articles regarding company efforts to address the obesity issue: "diet" (Stuart, 2007; Carpenter, 2004); "fiber" ("Kraft flags," 2005); "low-carb" (Carpenter, 2004), and "sugar-free" (Thompson, 2006). Through this preliminary analysis of the data, a total of 514 Facebook messages (3.5% of the total Facebook messages: 117 posts from the three parent company Facebook pages and 397 posts from seven brand Facebook pages) were identified for addressing the obesity issue. Since this study was not interested in how parent companies' Facebook posts on the obesity issue differ from their brand Facebook posts, all of these messages were combined and included for the final analysis to answer the research questions.

Variables Measured

Issues management efforts used to communicate about the obesity issue. This variable was measured by examining two tactics – (a) information sharing and (b) providing solutions for the obesity issue (Hainsworth & Meng, 1988; Jones & Chase, 1979). Information sharing issues management efforts were measured using four items: Does the company share information (a) about the obesity issue?; (b) about exercise/ how to stay in shape?; (c)

about healthy recipes?; and (d) from other sources such as news articles or health research? Issues management efforts of providing solutions for the obesity issue were measured using four items that were adopted from (Verduin et al., 2005): messages that mention (a) collaborating with government; (b) collaborating with schools; (c) collaborating with the medical community; and (d) giving nutritional information or discussion of providing the best nutritional choices to stakeholders.

Social media tactics used by food corporations to increase two-way communication. Three items were adopted from previous research (Kim et al., 2014) regarding interactivity components. Adopted items include messages that (a) seek feedback/opinion/comments from stakeholders (e.g., "What do you think?" or "Tell us how you feel"); (b) prompt stakeholders to act in some way (e.g., "Upload a photo," "Learn more by going to this website," or "Try this recipe to stay healthy"); and (c) ask personal questions (e.g., "Tell us your favorite healthy food," "What is your favorite way to stay active").

Frames used by food corporations to frame the obesity issue. This variable was measured by adopting the most frequently adopted frames found in previous research conducted by Darmon et al. (2008). Table 1 provides a list with descriptions and measures of each frame. The Global Initiatives, Product Nutrition, Marketing Practices, Consumer Information frames were measured with 4 items, and Advocacy and Dialogue was measured with 3 items.

Stakeholder responses on social media. Stakeholder responses were measured by identifying (1) the number of stakeholder comments; (2) the number of stakeholder

Table 1
Definitions of Obesity Issue Frames (Darmon et al.,
2008)

Frame	Description/Measure Items
Global Initiatives to Help Address Rise in Obesity (Global Initiatives)	Focus on the organization's (1) commitment to support healthier lifestyles, (2) commitment to making it easier for stakeholders to eat better, (3) steps the organization plans to take to help battle obesity, and (4) global initiatives to help address the rise in obesity (in general).
Product Nutrition	Focus on (1) the importance of product nutrition, (2) portion size, (3) the nutritional characteristics of products, (4) efforts to provide healthier options or improve nutritional value of current products
Marketing Practices	Focus on (1) the organization's intent to eliminate marketing in schools, (2) criteria the organization will coordinate with the vending industry to decide which of the organization's products are most appropriate to offer in school vending machines, (3) organizational guidelines for advertising and marketing practices to stress healthy and active lifestyles, and (4) discussion of marketing practices in general.
Consumer Information	Focus on (1) nutrition labeling, (2) the organization's addition of nutrition information to product labels to help make consumer choices easier, (3) health-related claims, and (4) discussion of consumer information in general.
Advocacy and Dialogue	Focus on (1) the organization's efforts of advocating for public policy changes, (2) efforts to increase conversation about the obesity issue with its stakeholders, and (3) discussion of advocacy and dialogue in general.

"likes," and (3) the number of "shares" in order to determine how the types of issues management efforts, interactivity tactics, and obesity issue frames were related to these three variables.

Coding Procedure

A coding protocol was designed to capture the variables under investigation with definitions and examples of each variable. All items were coded based on the dichotomy of the message's presence (i.e., 1 or 0) to minimize the possibility of subjectivity in terms of the coders' decisions. Coders also coded the frequency of some items as appropriate, such as keywords, solutions used, and frames. The unit of analysis was each FB post. Two coders independently coded 20 percent ($n = 104$) of the total sample ($n = 514$) to determine intercoder reliability of the study. Every 5th message was selected to be coded in the intercoder reliability check. Our intercoder reliability was deemed strong and acceptable (i.e., Krippendorff's alpha coefficents ranged from .72 to 1.0).

Results

RQ1a asked what kinds of issues management efforts (i.e., information sharing and providing solutions) food corporations are adopting when managing the obesity issue on social media. Our results demonstrated that 93% of the messages ($n = 478$) in the sample shared information about the obesity issue with stakeholders on Facebook by mentioning "healthy ($n = 191$)," "nutrition ($n = 171$)," "portion size ($n = 130$)," "low-calorie ($n = 110$)," and "obesity ($n = 2$)." It is, however, interesting to note that the keyword "obesity" was only used twice when sharing infor-

mation about the obesity issue. The remaining seven percent of corporate messages ($n = 36$) did not necessarily share information about the obesity issue (e.g., "What is your favorite way to stay healthy?"). One hundred and fifty seven messages (30.5%) in the sample talked about sports, exercise or staying in shape. Thirty-nine messages (7.6%) shared information through healthy recipes, and 207 messages (40.3%) in the sample shared information by mentioning another source or a website.

Four hundred twelve messages (80.2%) in the sample provided solutions for the obesity issue. Of those solutions that were communicated, 319 messages (62.1%) gave stakeholders nutritional information to empower them to make the right (i.e., healthy) choices, 34 messages (6.6%) in the total sample talked about collaborating with non-profits, 29 messages (5.6%) mentioned collaboration with government, 22 messages (4.3%) discussed collaboration with schools, and 8 messages (1.6%) talked about collaborating with the medical community.

RQ1b asked if there are any differences among the issues management efforts used by food corporations in terms of stakeholders' dialogue participation, positive reaction and willingness to share messages with others. For sharing information tactics, this study's results suggested there were significantly positive correlations between sharing information about exercise/how to stay in shape and the number of "likes" ($r = .119$, $p < .01$) and between providing healthy recipes and the number of "shares" ($r = .190$, $p < .01$). No other positive relationships were found for other issues management efforts. In addition, there were no positive correlations for the number of "comments" ($p > .01$) among the issues management ef-

Interactivity Tactics Used

Number of Messages

28%   37.4%   18.5%

Seek Feedback from Stakeholders | Prompt Stakeholders to Act | Ask Stakeholders Personal Questions
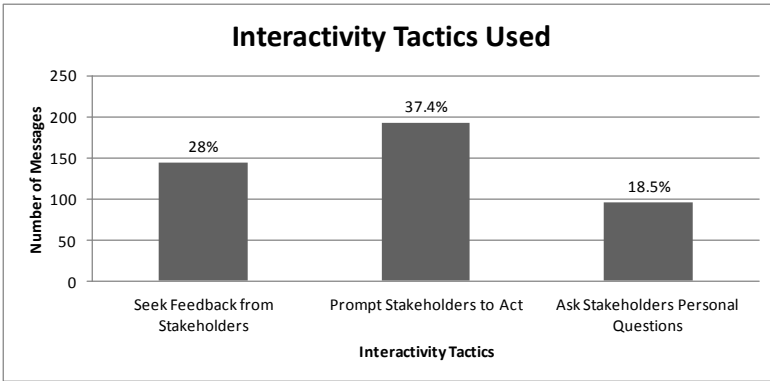
Interactivity Tactics

Figure 1. Interactivity tactics frequently used in messages that addressed obesity issue.

forts. As to the issues management efforts of providing solutions tactics for the obesity issue, none of the five solution tactics were significantly correlated with the number of "comments," "likes" and "shares" (i.e., (1) collaborating with nonprofits; (2) collaborating with government; (3) collaborating with schools; (4) collaborating with the medical community; and (5) providing nutritional information to empower stakeholders to make the right choices.

RQ2a focused on identifying the social media interactivity tactics that food corporations are using to increase two-way communication with stakeholders. Of the content types used for wall posts ($n = 268$), text-only wall posts were most frequently used (22%, $n = 113$), followed by text plus a photo (14.4%, $n = 74$), text plus the corporation's logo (8%, $n = 41$), text plus a video (5.3%, $n = 27$), and lastly, text plus a poll (2.5%, $n = 13$). Of the messages in the total sample, responding comments were used in 246 messages (47.9% of the sample) to discuss the obesity issue.

In regard to the interactivity elements used, 192 messages (37.4%) prompted action from stakeholders, 144 messages (28% of the sample) sought feedback from stakeholders, and 95 messages (18.5%) asked stakeholders personal questions (see Figure 1). The majority of messages were posted by the corporation's official Facebook account (n= 497, 96.7% of the sample), whereas 13 messages (2.5% of the sample) were using an individual voice, with Kraft being the only corporation that allows individuals to post answers on behalf of the corporation.

RQ2b was asked to determine if there are any differences among interactivity tactics adopted and the variables of dialogue participation ("comments"), positive reaction ("likes") and willingness to share with others ("share," only available in cases when the corporate message was a wall post). Results of correlation analyses (shown in Table 2) suggested there were significant positive relationships between the number of stakeholder comments and the seeking feedback tactic (r= .225, p < .01) and asking stakeholders personal questions (r= .223, p < .01). There were no other significant relationships (positive or negative) found relating to messages that sought action (r= -.026, p > .01). This finding is consistent with previous research (Kim et al., 2014) regarding the correlation of interactivity features with the number of comments.

In terms of the number of stakeholder "likes," there were significant positive relationships with tactics of seeking feedback (r= .200, p < .01) and asking personal questions (r= .139, p < .01). No significant relationship was found for prompting stakeholders to act (r= .015, p > .01). Finally, there were no significant relationships between the number of "shares" and any of interactivity tactics (see

Table 2

Relationships between Interactivity Tactics and Number

	Interactivity Tactics		
	Seeking Feedback from Stakeholders	Prompt Stakeholders to Act	Ask Stakeholders Personal Questions
# of Stakeholder Comments	.225**	-.026	.223**
# of Stakeholder "Likes"	.200**	.015	.139**
# of Stakeholder "Shares"	.078	-.011	-.003

*Note: ** indicates statistical significance at p <.01.*

Table 2).

RQ3a asked how food corporations are framing the obesity issue on social media. A total of 80.5 percent ($n = 414$) of the messages in the sample used one or more of the previously found frames, whereas 19.5 percent ($n = 100$) of the messages did not have a specific frame. Of those that matched with frames from previous research, the Product Nutrition frame was used in the most messages ($n = 457$, 88.9%), followed by the Global Initiatives frame ($n = 212$, 41.2%), and Advocacy and Dialogue frame ($n = 94$, 18.3%). The Consumer Information frame ($n = 18$, 3.5%) and Marketing Practices frame ($n = 0$) were the least used (se Table 3 for details).

RQ3b asked if there are statistically significant differences among the five obesity issue frames, specifically in terms of the number of "comments," "likes," and

Table 3
Frequently Used Obesity Issue Frames on Social Media

Frames	# Messages Using Frames	Frequency of Frames
Global initiatives to address rise in obesity	27	30
Commitment to support healthier lifestyles	111	117
Commitment to making it easier to eat better	50	52
Steps/ plans to help battle obesity	24	28
Product nutrition	212	337
Portion/ serving size	27	118
Nutritional characteristics of products	178	315
Efforts to provide healthier options	27	29
Improving nutritional value of current products	13	16
Marketing practices	0	0
Eliminating marketing in schools	0	0
Coordination with school vending industry	0	0
Mktg/ adv to stress healthy/ active lifestyles	0	0
Consumer information	8	8
Discuss nutrition labeling	10	12
Adding nutritional info to product labels	0	0
Discuss health-related claims	0	0
Advocacy and Dialogue	47	48
Actions to advocate for public policy changes	2	2
Increase dialogue about obesity issue	45	47

"shares" generated by each frame. Facebook messages with one major frame were considered for analyses, while those with more than one frame were then eliminated due to the uncertainty of which frame may have a dominant effect on dependent variables, and Marketing Practice and Consumer Information frames were removed due to lack of their usage. After compiling those that included only one major frame ($n = 368$), ANOVAs were conducted. Results revealed that there were no significant differences among the frames used in terms of generating stakeholder comments ($p > .05$). However, there were significant mean differences among the obesity frames in the number of "likes" ($F(2, 365) = 68.47$, $p < .001$, $\eta_p^2 = .16$). Scheffe post hoc analysis indicated that the mean score for the Advocacy and Dialogue frame ($M = 87.88$) was significantly higher than Product Nutrition frame ($M = 47.28$, $p < .05$) and Global Initiatives frame ($M = 14.19$, $p < .005$) in the number of "likes." In addition, Product Nutrition frame generated significant more "likes" than Global Initiative frame ($p < .05$). This indicates that the Product Nutrition frame and Advocacy and Dialogue frames are more effective than the Global Initiatives frame in terms of generating "likes." There were no significant differences among the frames in the number of "shares" ($p > .05$).

To further investigate relationships between frame use and the number of stakeholder "comments," "likes," and "shares," correlation analyses were run for all frames without dropping any cases that presented more than one frame, but excluding messages that did not use any frames (i.e., Marketing Practices frame). Results showed that the Product Nutrition frame had significantly positive relationships with the number of "comments" ($r = .116$, p

< .05) and "likes" (r= .103, p < .05), but no relationships with "shares." The Advocacy and Dialogue frame had a significantly positive relationship with the number of "likes" (r= .143, p < .01), but no relationships with the number of "comments" or "shares." Interestingly, the Global Initiatives frame revealed negative relationships with the number of "comments" (r= -.164, p < .01) and "likes" (r= -.206, p < .01), but no significant relationship with the number of "shares." The Consumer Information frame did not reveal significant relationships with any of dependent variables.

Discussion

This study examined how food industry corporations are managing and framing the obesity issue on social media. The tactics examined in this study are responses to increasing public scrutiny of food corporations for their roles in the growing obesity epidemic. Findings of this study contribute to the development of current literature on issues management and social media and provide a benchmark for other food corporations that are not currently using Facebook to maximize issues management efforts in regard to the obesity issue.

Issues Management Tactics

Although corporations examined in this study are, in fact, actively using Facebook, they are not using this medium to communicate frequently about the obesity issue (i.e., only 3.5% of the messages examined addressed the obesity issue). The majority of obesity messages were focused on both sharing information with stakeholders and providing at least one solution to the obesity issue. For ex-

ample, these messages mentioned another health-related source or website and provided information related to exercise and how to stay in shape. Most of solution messages provided stakeholders with nutritional information to empower them to make healthy choices; however, only a few messages addressed solutions of collaborating with government, non-profit organization, schools, or medical community. In other words, by providing information about healthy recipes and lifestyles, food corporations are taking a very personal approach to solving the issue on an individual level, and according to the findings of the study, their stakeholders are receptive to this approach as they were found to "like" and "share" this information with their Facebook friends.

Findings also revealed that no single tactic of providing solutions generated more activity from stakeholders than the others. However, it is evident that food corporations should pay more attention to providing specific solutions to their stakeholders, especially those related to informing them how to collaborate with other entities such as the government, non-profit organizations, or schools. As an important component of issues management, practitioners should show initiative by providing specific solutions alongside information-sharing efforts (Jones & Chase, 1979). This research suggests that food corporations are not practicing this tactic as effectively as they could be.

In addition, the food corporations examined in this study *defined* the obesity issue without actually using the term *obesity* in their messages. This is most likely an overt attempt to avoid the appearance of chastising individuals with weight issues, or referring to them in a derogatory manner. For those affected, obesity is a potentially offen-

sive and sensitive issue, and corporations attempting to discuss it with their stakeholders must take this into consideration. The more appropriate response to the obesity issue, as indicated by the findings of this study, is to address it in a positive or optimistic manner.

Extant research suggests that social media, such as Facebook, have the potential for two-way communication (Perry et al., 2003), and findings from the current study further support this argument. Food corporations examined in the study are mainly using wall posts in their efforts to increase two-way communication with their stakeholders. In addition, they tend to use interactivity tactics by personalizing their messages and making direct requests for feedback from their stakeholders. Findings revealed that food corporations received likes or comments from their stakeholders when direct and personal requests were made for such information. This is consistent with the findings of previous research (Kim et al., 2014), in that when companies use messages that seek feedback from stakeholders, or messages that ask stakeholders personal questions, they are more likely to interact with the companies. However, only 38% of the messages examined in the study prompted action and only 28% sought feedback. This finding indicates that food corporations are not taking full advantage of the capabilities of social media in their issues management efforts.

In the context of this study, the *like* and *share* features of Facebook pose interesting implications for public relations researchers and practitioners. These features are user responses to the active processing of a message, image or video, yet it is still unclear what a *like* truly represents in terms of consumer feedback. Future research

must determine if a Facebook *like* or *share* represents a favorable perception of the message, agreement with the message, and if so, to what degree. More importantly, future research could also investigate if messages that do not receive *likes* or *shares* indicate that stakeholders are not receiving the messages, or if it indicates disapproval of the messages.

Framing the Obesity Issue

Another goal of this research was to understand how food corporations are framing the obesity issue when communicating directly with stakeholders on social media. When used as tools for issues management, frames can influence stakeholders through second-level agenda setting (Kiousis, Popescu, & Mitrook, 2007). Previous research revealed that the Product Nutrition frame and the Global Initiatives frame were among the most frequently used obesity issue frames when communicating in traditional media (Darmon et al., 2008). This study found that these same obesity issue frames are used by food corporations in Facebook messaging.

Findings from this study indicate that a major difference exists in terms of food corporations' use of the Marketing Practices frame. Previous research (Darmon et al., 2008) identified the Marketing Practices frame as the second most frequently used obesity issue frame via traditional media; however, when examining the obesity issue frames that food corporations use in Facebook messaging, none of the messages included the Marketing Practices frame. One possible explanation for this finding is food corporations may be taking advantage of the marketing capabilities inherent in providing healthy recipes that re-

quire the use of the company's food products. This results in a win-win situation as stakeholders receive healthy recipes and food corporations, in turn, can promote healthy uses for their products. Stakeholders examined in the current study were receptive to this technique as use of the Product Nutrition frame resulted in higher numbers of likes and comments.

This study suggests that the Product Nutrition and Advocacy and Dialogue frames are more effective in generating positive responses (i.e., likes) from stakeholders than the Global Initiatives frame. The product nutrition frame was effective in generating both dialogue with stakeholders and positive stakeholder responses, while the advocacy and dialogue frame was effective only in generating positive stakeholder responses. Interestingly, the Global Initiatives frame was negatively related to stakeholder dialogue participation and positive response. Given that the Global Initiative frame was the second most frequently used frame on Facebook in this study's sample, this particular finding raises a red flag for current framing practices among food corporations.

The Global initiatives frame is represented by messages that demonstrate the organization's commitment to support healthier lifestyles and steps the organization plans to take to help battle obesity on a global or macro-level. In terms of favorable consumer perceptions, the lack of stakeholder support for this frame, as identified in the current study, supports the argument that a micro-level, personalized approach works best when approaching the obesity issue on social media (Sung & Kim, 2014). Social media are, in fact, intended to be social, meaning users expect personalized conversation about subjects and ideas

that are relevant and immediately useful in their own lives.

Implications

This study addresses the unique relationship between issues management and framing on Facebook, and can therefore be used as a benchmark for other food corporations. Understanding which interactivity tactics and frames will generate more communication with stakeholders contributes to the development of scholarship in these fields and helps practitioners decide which tactics are best to use when communicating directly with stakeholders about the obesity issue on Facebook. Considering the number of stakeholders who have shown interest in connecting with corporations, as indicated by the large quantity of stakeholders who have *liked* or *talked about* the corporations, there is a tremendous opportunity in terms of using this medium for issues management. Practitioners should recognize the potential for direct communication with such large groups of active stakeholders and understand that it is an opportunity to build relationships with stakeholders. Practitioners can use some of the following tactics to maximize communication efforts.

Social media offer opportunities for two-way communication with stakeholders. The results of this study imply that corporations can be involved in the discussion of issues in social media, but they must use different personalized tactics (e.g., prompting stakeholders to engage in conversation with each other) to involve them in discussion about the issue. This finding presents interesting theoretical implications, as the nature of how corporations communicate and approach issues via social media may be

fundamentally different from how corporations communicate via traditional media. Because social media allow for two-way communication, corporations can pose questions and act as facilitators for discussion of issues amongst stakeholders. This is not an opportunity found in traditional media, as it is more one-way in nature.

While the corporations in this sample are active on Facebook, they are only dedicating a small percentage of their messages to communicating about the obesity issue with stakeholders. Framing can be used as an effective issues management strategy. While many messages in the sample share information, practitioners should consider providing specific solutions for the obesity issue, especially regarding how to collaborate with other entities such as non-profit organization, government, or schools, alongside messages that share information about the issue.

Food corporations attempting to increase two-way communication with their stakeholders should use more direct and personalized requests for such communication. Stakeholders are less receptive to messages lacking personalization, which is backed by findings from this study that demonstrate how direct requests for feedback or dialogue results in more *likes* from stakeholders. Based on the lack of differences found between the voice used (e.g., official or individual) in generating stakeholder responses, the voice from which the message originates is less important to apply than are other, more effective, interactivity tactics.

In terms of framing, practitioners should use messages that include a Product Nutrition frame, as it tends to generate the most dialogue and positive reaction from stakeholders. The Advocacy and Dialogue frame should

also be used, as it tends to be effective in generating posi-
tive reaction among stakeholders. Contrastingly, practitio-
ners should avoid using a Global Initiatives frame if the
objective is to encourage dialogue from stakeholders or to
gain positive reaction as this frame is likely to generate
negative stakeholder responses.

Limitations and Future Research

Findings and lessons learned from this study can
be helpful to scholars and practitioners. However, there
are some limitations. The data were limited to one-year
time frame. Also, this study only investigated the issues
management and framing techniques used on Facebook,
and did not examine other social media platforms. There-
fore, it cannot be generalizable to all of social media, as
the metrics and features of Facebook differ greatly from
that of Twitter, blogs, and other social media platforms. In
addition, the sample and the issue was limited: only three
parent companies and seven brand corporations included
in the *Fortune* 500 list were examined in this study for
food corporations' obesity issue management. Future re-
search should investigate if the same results are found
among other industry, other food industry corporations
(such as fast food, dining and restaurant industries), as
well as across other social media platforms (for example,
Twitter and corporate blogs). Another limitation is that
this study only examined the frames found in previous re-
search (Darmon et al., 2008). Previous research was help-
ful in defining frames that are frequently found in tradi-
tional media; however, there may be other frames that
could be examined outside of the findings of previous re-
search. Finally, expanding the findings of this study re-

garding interactivity tactics, future research should compare the effectiveness of each interactivity tactic through experiments. It is hoped that future research will be conducted to expand on this research and to further contribute to the development of issues management, framing, and social media literature and practice.

Conclusion

The emergence of social media has provided yet another means in which organizations can respond to environmental concerns and issues. Traditional views of issues management depict the dialogue between organizations and their stakeholders as taking place in the public forum through the use of traditional media. Organizations are now able to proactively manage potentially threatening issues with various forms of social media, all of which provide direct and immediate access to their most relevant stakeholders. While these mediums and their capabilities provide fruitful avenues for improving issues management efforts, further research is needed to determine how organizations can interpret novel stakeholder responses such as "likes" and "shares" and, more importantly, if these responses indicate effectiveness in terms of an organization's issues management efforts.

References

"Adult Obesity." (2015). In *Centers for Disease Control and Prevention.* Retrieved from http://www.cdc.gov/obesity/data/adult.html.

Carpenter, D. (2004, August 23). Kraft, like America, thinks healthy; Diet-conscious products catering to health concerns. *The Columbian*, p. e2. Retrieved January 22, 2012, from LexisNexisX.

Chong, D., & Druckman, J. N. (2007). Framing theory. *Annual Review of Political Science*, *10*, 103–126.

Coombs, T. (2007). *Ongoing crisis communication: Planning, managing and responding.* Thousand Oaks, CA: Sage Publications, Inc.

Coombs, T. (2010). Crisis communication and its allied fields. In W.T. Coombs & S.J. Holiday (Eds.), The *Handbook of Crisis Communication* (pp. 54-64), Oxford, UK: Wiley-Blackwell.

Darmon, K., Fitzpatrick, K., & Bronstein, C. (2008). Krafting the obesity message: A case study in framing and issue management. *Public Relations Review, 34*(4), 373-379.

Diem, N. (2015, June 6). Obesity lawsuits: Who's to blame when fast food makes you fat?, Retrieved from http://lawstreetmedia.com/issues/law-and-politics/weighing-obesity-lawsuits/

Dougall, E. (2008). Issues management. Institute for Public Relations. Retrieved from http://www.instituteforpr.org/issues-management/

Freeman, R. E. (1984). *Strategic management: A stakeholder approach.* Boston, MA: Pitman.

Freeman, B., & Chapman, S. (2007). Is "YouTube" telling or selling you something? Tobacco content on the YouTube video-sharing website, Tobacco Control, 16, 207-210.

Gonzalez-Herrero, A., & Smith, S. (2008). Crisis communications management on the Web: How Internet-based technology are changing the way public relations professionals handle business crises. *Journal of Contingencies and Crisis Management,* 16(3), 143-153.

Hainsworth, B., & Meng, M. (1988). How corporations define issue management. *Public Relations Review,* 14(4), 18-30.

Hallahan, K. (1999). Seven models of framing: Implications for public relations. *Journal of Public Relations Research,* 11(3), 205-242.

Hearit, K. M. (1999). Newsgroups, activist publics, and corporate apologia: The case of Intel and its Pentium chip. *Public Relations Review,* 25(3), 291–308.

Heath, R. L. (1990). Corporate issues management: Theoretical underpinnings and research foundations. *Public Relations Research Annual,* 2(4), 29-65.

Heath, R. L., & Palenchar, M. J. (2009). *Strategic Issues Management: Organizations and Public Policy Changes. 2nd ed.* Thousand Oaks, CA: Sage Publications, Inc.

Jiang, H., & Bowen, S. A. (2011). Ethical decision making in issues management. *Public Relations Journal, 5*(1), 1-21.

Jones, B. L., & Chase, W. H. (1979). Managing public policy issues. *Public Relations Review,* 5(2), 3-23.

Kelleher, T., & Miller, B. M (2006). Organizational blogs and the human voice: Relational strategies and relational outcomes. *Journal of Computer-Mediated Communication, 11* (2), 395.414.

Kim, S., Kim, S. Y., & Sung, K. H. (2014). Fortune 100 companies' Facebook strategies: Corporate ability versus social responsibility. *Journal of Communication Management 18(*4), 343-362. doi: 10.1108/JCOM-01-2012-0006

Kiousis, S., Popescu, C., & Mitrook, M. (2007). Understanding influence on corporation reputation: An examination of public relations efforts, media coverage, public opinion, and financial performance on an agenda-building and agenda-setting perspective. *Journal of Public Relations Research, 19*(2), 147-165.

Kraft flags new ad strategy to promote healthy food options for children. (2005, January 13). *Hamilton Spectator,* p. A16. Retrieved January 22, 2012, from LexisNexisX.

Lawrence, R. G. (2004). Framing obesity: The evolution of news discourse on a public health issue. *The International Journal of Press/Politics,* 9(3), 56-75. DOI:10.1177/1081180X04266581.

Macnamara, J. (2010). Public relations and the social: How prac-

titioners are using, or abusing, social media. *Asia Pacific Public Relations Journal, 11*, 21-39.

Mahon, J. F., & Waddock, S. A. (1992). Strategic issues management: An integration of issue life cycle perspectives. *Business Society, 31*(19), 19-32.

McCorkindale, T. (2010). Can you see the writing on my wall? A content analysis of the Fortune 50's Facebook social networking sites. *Public Relations Journal, 4*(3).

Ogden, C. L., Carroll, M. D., Kit, B. K., & Flegal, K. M. (2014). Prevalence of childhood adult obesity in the United States, 2011-2012. *The Journal of American Medical Association, 311*(8), 806-814. doi: 10.1001/jama.2014.732.

Perry, D. C., Taylor, M. & Doerfel, M. L. (2003). Internet-based communication in crisis management. *Management Communication Quarterly,* 17(2), 206-232.

Regester, M., & Larkin, J. (2008). Risk issues and crisis management in public relations: A casebook of best practices. [Books24x7 version] Available from http://common.books24x7.com/toc.aspx?bookid=28479.

Stein, C. J., & Colditz, G. A. (2004). The epidemic of obesity. *Journal of Clinical Endocrinology & Metabolism*, *89*(6), 2522-2525.

Stuart, D. (2007, October). Kellogg bets on breakfast boost. *Promotions & Incentives,* 18-19. Retrieved January 23, 2012, from ABI/INFORM Global. (Document ID: 1372090731).

Sung, K. H., & Kim, S. (2014). I want to be your friend: The effects of organizations' interpersonal approaches on social networking sites, Journal of Public Relations Research, 26 (3), 235-255, doi; 10.1080/1062726X.2014.908718

Sweetser, K. D. (2010). A losing strategy: The impact of nondisclosure in social media on relationships. *Journal of Public Relations Research, 22* (3), 288-312.

Thompson, S. (2006, January). Standing still, Kellogg gets hit with a lawsuit. *Advertising Age,* 77(4), 1, 25. Retrieved

January 21, 2012, from ABI/INFORM Global. (Document ID: 977858531).

Thorpe, K. E., Florence, C. S., Howard, D. H., & Joski, P. (2004). The impact of obesity on rising medical spending. *Health Affairs,* 23, 283-283.

Verduin, P., Agarwal, S., & Waltman, S. (2005). Solutions to obesity: Perspectives from the food industry. *American Journal of Clinical Nutrition, 82*(1), 259S-261S.

Waters, R.D., Burnett, E., Lamm, A., & Lucas, J. (2009). Engaging stakeholders through social networking: How non-profit organizations are using Facebook. *Public Relations Review,* 35, 102-106.

Zieff, S.G., & Veri, M.J. (2009). Obesity, health, and physical activity: Discourses from the United States. *Quest,* 61(2), 154-179.