

# A Case Study of the Crisis Communications Used in the 2009 *Salmonella* Outbreak in Peanut Products

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## Abstract

The 2009 *Salmonella* outbreak in peanut products caused by contaminated peanut butter created a period of negative publicity for the peanut industry in the United States. It was one of many large food outbreaks the United States has seen in the past few years. Although one company was the cause of the outbreak, the peanut industry worked together to maintain its reputation. Crisis communications plans were put into effect, and crisis management teams worked together throughout. The purpose of this study was to examine the crisis communications efforts taken by peanut industry public relations practitioners during the 2009 *Salmonella* outbreak and determine which efforts had a successful outcome and which were ineffective. A case study methodology was employed whereby interviews with public relations practitioners that were working in the peanut industry during the crisis were conducted to address the research objectives. The findings indicate that a crisis communications plan is imperative for any organization, with the understanding that every crisis is unique and plans should be adapted accordingly. Plans should include, at the minimum, a crisis management team, a list of audiences that should be contacted, and key messages. In addition, media training should be conducted for potential spokespeople and relationships should be developed with members of the media before a crisis occurs. Investigation of the data and literature allowed the researchers to create a pre-crisis, crisis, and post-crisis model for agricultural communications.

## Keywords

risk & crisis communication, *Salmonella*, foodborne illness, public relations, peanuts

## Introduction

A crisis can happen unexpectedly and can threaten an organization's expectations, place non-routine demands on the individuals involved, produce uncertainty, negatively impact performance, potentially produce negative outcomes, harm the organization or the public, and produce accusations concerning the organization(s) involved (Adkins, 2010). Crisis management can help fight a crisis, minimize the inflicted damage, and protect the organization, stakeholders, and industry from harm.

In 2009, the peanut industry was faced with a nationwide crisis: an ingredient-driven, widespread *Salmonella* outbreak that included 714 total cases and nine deaths in 46 states (Flynn, 2011). According to the Food and Drug Administration (FDA), there were more than 2,100 products in 17 categories voluntarily recalled by more than 200 companies, in addition to some pet food

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products that contained peanut paste made by Peanut Corporation of America (PCA), the company that was eventually found to be the source of the contamination (FDA, 2009). The outbreak ultimately cost American peanut producers \$1 billion in lost production and sales, not including losses to the other channels of distribution in the peanut industry (Hollis, 2009). Sales of jarred peanut butter were down by 24% that January (Hollis, 2009). In addition, 46 people that worked at the Blakely, Georgia PCA plant and 50 people working at the Plainview, Texas PCA plant lost their jobs (WSBTV.com, 2009).

Identification of the outbreak began in November 2008, even though instances of *Salmonella* were being reported as early as September of that year. The Centers for Disease Control and Prevention (CDC) first identified the multi-state cluster of *Salmonella typhimurium* infections (13 cases in 12 states) and began monitoring for additional reports of cases with the same DNA fingerprint (CDC, 2009). The reports peaked with more than 70 cases discovered between December 13 and December 27, 2008. The last report of positive *Salmonella* cases were reported to the CDC on April 28, 2009.

The CDC linked the outbreak to peanut butter products originating from PCA, which had plants in Georgia and Texas. PCA was a supplier of peanut paste and other peanut ingredients to numerous food manufacturers and large containers of peanut butter to the food service industry, making this the largest food recall at the time (Hollis, 2009).

By the end of December 2008, products linked to PCA were determined as the cause of the first death of the *Salmonella* outbreak. In early January 2009, PCA ceased production, and the FDA initiated a food safety investigation (Hartman & Barrett, 2009). An FDA inspection report (2009a) cited large openings along the sides and tops of the trailers that contained totes of raw or roasted peanuts in PCA's processing plant in Georgia. The report also noted (a) roaches; (b) mold on the walls, ceiling, and storage cooler; (c) dirty utensils and equipment used in food preparation; and (d) open gaps in the roof which allowed for wet conditions that could cause *Salmonella* contamination (Glanton, 2009). An independent food safety expert stated that, in the case of the 2009 outbreak, a leaky roof at the processing plant in Georgia was the probable source of the *Salmonella* contamination which allowed bird droppings and rainwater to enter the plant (Borrell, 2009).

### **Crisis Communications in Agriculture**

A major crisis can severely and rapidly damage an organization's reputation and financial standing (Jacques, 2010). When a crisis occurs, it creates a need for information, and through effective crisis communications, information and knowledge are refined and shared with key stakeholders (Coombs, 2010). A common mistake made by many companies and organizations is to think that a crisis cannot happen; however, crises happen all the time, and all organizations should be prepared with a crisis plan (Barton, 2001; Palmer, 2010). When a company does not have a crisis communication plan prepared, many times they do nothing in response to a crisis (Sandman, 1993).

The first step in preparing a crisis communication plan is to conduct a crisis audit, whereby an organization determines its strengths, weaknesses, and vulnerabilities, while also identifying key stakeholders, a potential crisis management team, and potential crisis situations (Heath & Coombs, 2006). The next step is to monitor for any potential risks and practice two-way communications in order to provide timely and accurate information to media, management, board members, and other stakeholders (Palmer, 2010). As a crisis occurs and evolves, the plan should be adaptable and

able to still be utilized (Leighton & Shelton, 2008).

Literature suggests the following guidelines be used in planning for future crises: form a crisis management team that will create and be able to implement the plan (Crandall, Parnell, & Spillan, 2010); list all audiences the organization needs to communicate with (Ferrante, 2010); have all contact information for stakeholders, media, and other valuable contacts (Ferrante, 2010); develop key messages and a method of dissemination; identify trustworthy media sources (Coombs, 2007); and conduct a crisis audit or mock drill at least once a year to test all of the materials and methods and to check for possible updates (Fearn-Banks, 2001; Palmer, 2010).

The media has paid particular attention to food safety stories since the *E. coli* in spinach outbreak in 2006 became of interest (Hanacek, 2007). Environmental or health activists were quoted in the media five times as often as food scientists when communicating about food safety since then. However, few reporters have science training, and few scientists have training in communicating with the media in clear and simple language (Anderson, 2000). This creates a problem when trying to inform the public about food safety issues and stories, especially since this information is so scientific and can be complicated to explain and understand. Irlbeck, Akers, and Palmer (2010) found the agricultural industry was rarely mentioned by the national television media during the 2009 outbreak, even though the peanut industry reported losses in the millions. Ten Eyck (2000) found that a possible reason for this is that the food and agriculture industries tend to shy away from the media. Agricultural organizations and companies should be proactive and develop communication materials to tell agriculture's side of the story, and as Irlbeck (2009) found, many reporters want agricultural information, but they are simply not familiar with the topic and do not know where to turn to find information.

News networks were significant media outlets for information in the wake of the 2009 *Salmonella* outbreak. Although third-party organizations, such as government agencies and peanut industry leaders, provided information to the print media (Millner, Veil, & Sellnow, 2011), Barr, Irlbeck, and Akers (2011) found that farmers were not included in the television media coverage of the story. Irlbeck et al. (2010) found the following:

Although the researchers noticed that no one interviewed a peanut grower, nor did any network present the frame of the farmer, peanut producers were not implicated at all by the national television media during the 2009 *Salmonella* outbreak. This was probably because peanut producers were not at fault, and the FDA's investigations clearly indicated that the blame was on the Peanut Corporation of America (p. 16).

As agricultural communicators have seen different large-scale crises in the industry in the past few years, many realize the importance of a crisis communications plan. This research can be used by public relations practitioners to prepare for and be proactive in creating and executing a crisis communication plan. This information can aid in the preparation for a potential crisis and can enable the practitioners to take proper measures in accordance to the current state of the crisis. This study is significant to the researchers because of the locus of the recall. One of PCA's plants is within an hour's drive from the researchers' institution, plus peanuts are a major commodity to the state, bringing in \$1 billion annually (Texas Peanut Producers Board, 2012). In addition, peanut butter is a major supermarket item. The average American consumes more than six pounds of peanuts and peanut butter products each year (National Peanut Board, 2009) making this outbreak of great national concern for both consumers and the agricultural industry.

## Theoretical Framework

This study was guided by the excellence theory first proposed by Grunig and Hunt (1984) with the four models of public relations: press agency, public information, two-way asymmetric, and two-way symmetric, or excellence communications. According to Grunig (1992), when an organization wants its communication efforts to receive favorable publicity, it utilizes press agency. Public information can be accomplished by communicating information to the public through the use of controlled media, such as newsletters, brochures, and direct mail. Both press agency and public information are one-way models of public relations and also asymmetrical models.

According to Grunig (1992), the most effective public relations model is the two-way symmetrical model. This model uses research to manage conflict and improve understanding through communications with strategic publics, which makes this a suitable theory for this research. Symmetry-based thinking views public relations as ongoing communication whereby “the public should be just as likely to persuade the organization’s management to change attitudes or behavior” (Grunig & Hunt, 1984, p. 23). A symmetrical model represents a balanced flow of communication whereby all parties are communicating with each other as equals (Stacks & Watson, 2007).

Although consumer buying patterns are monitored during a foodborne illness outbreak, they can also be used to determine the effectiveness of the communications efforts. Buying patterns plus other research helps develop messages to persuade the public to behave the way the organization wants (Grunig, 1992). Excellence communications in public relations can help organizations deal with an uncertain, and often threatening, environment (Murphy, 2007). Grunig et al. (1992) offered the following definition of strategic public relations related to crisis communications management:

If public relations can identify the strategic publics in the environment and manage the organization’s response to these interdependencies... public relations can help the organization reduce uncertainty and reduce conflict by stabilizing relationships with key publics on which the organization depends (p. 81).

Organizations must communicate symmetrically with publics (taking the interests of both the organization and publics into account) to cultivate high-quality, long-term relationships with them. Grunig et al. (1992) suggested that in order for an organization to achieve its goals, building long-term, positive relationships with strategic publics is important. Grunig (2008) found that good relationships were valuable to organizations since they reduced the costs of litigation, regulation, legislation, and negative publicity caused by poor relationships.

## Purpose and Objectives

The purpose of this study was to examine the crisis communication efforts taken by peanut industry public relations practitioners during the 2009 *Salmonella* outbreak and determine which efforts had a successful outcome and which were ineffective. The following research objectives were used to guide this case study:

1. Describe the crisis communication plans and actions executed by peanut industry public relations practitioners during the 2009 *Salmonella* outbreak.
2. Determine how well prepared the practitioners felt they were to deal with a crisis the size of the 2009 *Salmonella* outbreak.

3. Describe peanut industry public relations practitioners' perceptions of the effectiveness of their organization's communication efforts during the 2009 *Salmonella* outbreak.
4. Explain the lessons learned by practitioners as a result of their involvement in the 2009 *Salmonella* outbreak.

### Methodology

A case study investigates a bounded system, selected because it is intrinsically interesting (Smith, 1978). To study a case means that any method of gathering data, such as testing, interviews, observation, or others can be utilized (Merriam, 1998). For this study, the case was bound to the opinions, thoughts, observations, feelings, and memories of well respected national and state public relations practitioners and other spokespeople who were working in the peanut industry during the 2009 *Salmonella* outbreak. The lead researcher contacted numerous individuals that fit the criteria. After the researcher explained the goals and objectives of this study, seven practitioners agreed to be interviewed about their involvement in and opinions of the 2009 outbreak.

In-depth, face-to-face and telephone interviews were used to explore the viewpoints and perceptions of the public relations practitioners about the 2009 *Salmonella* outbreak. Interviews allow a researcher to gain personal insight from participants as well as obtain subjective information from those involved, including their feelings, attitudes, and beliefs (Berg, 2009).

The researcher used an interview guide and then asked follow up and clarification questions, which created an environment that fostered learning and insight into the participants involvement in and opinions of the outbreak (Berg, 2009). Participants were asked a series of questions concerning their involvement in the outbreak, preparedness, and effectiveness of their organizations' communications efforts, lessons learned from the outbreak, and improvements or changes to their crisis communication plan. The Texas Peanut Producers Board is near the researchers' university; therefore, several interviews took place in person. However, the peanut industry is located throughout the southern United States; so other participants were out-of-state, and the researcher did not have funding for travel. Berg (2009) stated that telephone interviews were an efficient means of collecting data, as long as they consist of precise and preconceived questions; therefore, three interviews were conducted via telephone. All interviews were conducted by the lead researcher and were recorded digitally.

Each participant was assigned a pseudonym before transcription, which assured confidentiality. Interviews were transcribed verbatim, and data were analyzed using open and axial coding with NVivo, a qualitative data analysis computer program. During the open coding, the researcher sorted the data into broad themes that helped address each research objective. Then the researcher categorized the data into sub-themes and used axial coding to ensure all aspects were considered.

The researchers recognized a potential bias as they typically advocate for agricultural producers. However, strategies were employed to achieve trustworthiness, such as establishing an audit trail of all recorded interviews, transcripts, observation notes, and NVivo files. Triangulation was accomplished through comparing interview transcripts, transcripts of news coverage of the outbreak, and literature related to the outbreak as well as crisis communications. Finally, the researcher was extremely cautious about interviewing participants who were actively employed and respected in the peanut industry at the time of the outbreak.

The time lapse from the actual 2009 *Salmonella* outbreak to these interviews, which were conducted in the fall of 2011, was a limitation to this study. The food industry has dealt with other

food recalls and foodborne illness scares since the 2009 outbreak, and the recollection of specific details and events from some public relations practitioners that occurred during the 2009 outbreak could have been impaired over time. The researcher requested an interview from the owner of PCA, but for legal reasons he was not allowed to participate. Interview requests from others associated with PCA went unanswered.

### Findings

Five participants worked in public relations in the peanut industry during the outbreak, one was the director of communications for a grocery chain in the South, and one was a farmer who was frequently interviewed during the outbreak.

#### Findings in Relation to Research Objective One

Research Objective One sought to describe the crisis communication plans and actions executed by peanut industry public relations practitioners during the 2009 *Salmonella* outbreak. Three themes emerged from the data for this objective: communication strategy, effective communications, and ineffective communications.

PCA did not communicate at all during the outbreak, so grower organizations and other peanut industry stakeholders had to provide the information throughout the crisis. All of the individuals interviewed stated that the American Peanut Council (APC) took the lead in all communication efforts. Through APC's planning and coordination, the state and other national groups worked together to communicate that the contamination was not the fault of peanut producers.

NAOMI (director of external affairs at crop producer's organization): APC did a great job of handling the communication during the outbreak. The main contact there took the lead in all communications and kept us informed through market reports and updates through daily email to keep us all on the same page. The peanut butter sales trends showed us how our efforts were affecting the market and helped us to know what was most effective.

CHET (director of state peanut commission): Our main message was that the industry had a bad actor that had been equally condemned by the industry and the public but that this was a rare exception and not a rule. We quickly followed this message with how many good companies are out there and you could buy anything (peanut product) you wanted provided you used caution to avoid recalled products.

The organizations decided delineation needed to be made between PCA and the farmers they represented, considering the farmers had nothing to do with the outbreak. The participants said their strategy was effective.

NAOMI (director of external affairs at crop producer's organization): We got to tell the story about farmers through press releases to local, state, and national media... We did interview after interview locally and over the phone, and we never turned an interview down. If we denied it and turned our back on it, we would be in trouble, and we had nothing to hide.

Another strategy participants found successful was to keep their executive committees, board members, officers and/or other stakeholders informed. The commodity group representatives said

that as soon as they did an interview or received talking points from APC they would notify their board members. The participants said all board members needed to be prepared to answer questions related to the outbreak as the board members were getting direct information requests from media. The participants said any communications mistakes were minimal, but several said they felt they had to work harder in light of PCA's refusal to comment.

CATHY (director of state peanut board): PCA was the textbook definition of what you should not do. I just remember there was a lot of no opinions, no comment, pleading the fifth, and stating that the owner was not available for comment. In my opinion, mean people were ready to string PCA up anyway and that immediately painted them as the villain.

### **Findings in Relation to Research Objective Two**

Research Objective Two sought to determine how well prepared the practitioners felt they were to deal with a crisis the size of the 2009 *Salmonella* outbreak. Although members of state peanut associations did not expect to be a part of the crisis communications team, they soon were as the outbreak spread nationally. Timeliness was key and the organizations did not delay.

CATHY (director of state peanut board): We knew we had to act fast because they were linking (our state's) peanut producers and farmers to the outbreak.

Some of the organizations effected by the outbreak had a crisis communications plan, and others did not.

WILLAM (involved at the national level of the peanut council): Initially we had a crisis plan for our crisis team and we knew we had to work immediately. We knew that all parts of the industry had to be represented: farmers, suppliers, and allied members. Everyone in the industry had a voice in order to respond to the crisis and that is how we were participating.

CHET (director of state peanut commission): The industry, through the American Peanut Council, had a crisis plan but it was more of a 'who' than 'what' type of plan. There is no way you can have a plan for the details of what we went through. We did have media trained spokespersons and an understanding that we had to have a common message which was clearly understandable to the consumer.

Overall, the public relations practitioners shared the central thinking that with or without a crisis communications plan, it was necessary to take action immediately in light of that crisis. The national organization was prepared with a plan and crisis team already composed and this allowed the smaller state organizations to work with them to implement the plan.

Several participants noted they had conducted media training sessions with their board members, executive officers, or other stakeholders before the crisis had occurred. This standard practice for many of the organizations' board members was invaluable in 2009 as it took much of the workload and worry off the practitioners.

NAOMI (director of external affairs at crop producer's organization): Having those guys and girls know how to talk to the media, how not to ramble, what they should or shouldn't say, and how

not to get off topic- having that done beforehand is very useful and then once you provide them with talking points and make sure they are familiar with them so that when it is their time in front of the camera and you know they are ready to roll and they will stay on target.

### **Findings in Relation to Research Objective Three**

Research Objective Three sought to describe peanut industry public relations practitioners' perceptions of the effectiveness of their organization's communication efforts during the 2009 *Salmonella* outbreak. Most said their communications efforts were effective as peanut butter sales for 2009 as a whole were not impacted.

CATHY (director of state peanut board): I think that we would have really seen supplies drastically decrease for a whole lot longer had we not been turning it around and communicating to everyone. When the economy gets bad, people really start eating a lot of peanut butter.

Having strong contacts with the media before the crisis occurred was one helpful way in which the participants were able to communicate with the general public.

CATHY (director of state peanut board): Having a core group of media people already in the wings to submit information to is helpful. We had made a couple of contacts with local media, including an AP writer, which is an automatic ticket to anywhere and everywhere.

Strong media contacts, answering all information requests, granting interviews, keeping stakeholders informed, and posting information daily to the organization's website are all methods in which the participants were able to effectively communicate their messages throughout the crisis.

### **Findings in Relation to Research Objective Four**

Research Objective Four sought to determine what lessons practitioners learned as a result of their involvement in the 2009 *Salmonella* outbreak. Flexibility was a key lesson that several shared; although a crisis plan is a must, a crisis itself will not follow a plan.

WILLIAM (involved at the national level of the peanut council): The thing is, plans are a wonderful thing, but unfortunately crises do not follow plans. They have their own speed and life. They have a lot of aspects that you cannot anticipate. No one would have ever anticipated that the biggest recall in American history would come from our products. Obviously that is not the case anymore, there have been other recalls, but at that time it was the largest in American history. You know you cannot account for that in a crisis plan.

In addition to a plan, William noted that having a team that was trained and understood responsibilities in the event of a crisis was a key factor in handling the communications during the outbreak. Some of the state organizations said that although they did not have a crisis plan in place, they realize its importance and had since made preparations for a potential crisis.

In 2009, social media was not as important as it is now. Many of the state organizations said their communications would have been different had Twitter been more widely used at that time.

SAVANNAH (Naomi's intern): I look back and it wasn't that long ago, but you think about the difference of social media now and social media then, and it is huge. The difference now is social media.

Savannah, Naomi, and Cathy all agreed that their plans have changed to incorporate social media as a major component. Having information readily available in a matter of seconds means practitioners must be quick in releasing accurate information and responding to media questions.

## Conclusions

It is important for any organization to realize that a crisis can happen; therefore, a plan should be in place. As the crisis stages change, the plan should be adaptable and able to still be utilized (Leighton & Shelton, 2008). APC had a plan and the state organizations adopted it during the 2009 crisis. An important activity in creating the plan is to establish a crisis management team (Crandall et al., 2010). APC kept its team, which included the state organizations, well informed of market trends, changes in the situation, interviews, key messages, talking points and stories broadcast or printed. The state organizations followed APC's example. In addition, nearly all of the participants said they had trained spokespeople well ahead of time. Because of this preparedness, Naomi said her organization never turned down an interview request.

Ferrante (2010) said that all plans should have a list of audiences with contact information. The participants in this study said they had established lists that included board members, staff, farmers, members of the peanut supply chain, and especially the media that they used throughout the crisis. Cathy noted that her organization had developed relationships with reporters ahead of time, which proved to be extremely helpful when she needed the media to help her get information out, which aligns with the suggestions of Coombs (2007). It is important to note that many reporters are unfamiliar with agriculture, and as Irlbeck (2009) stated, many reporters would like to have more agricultural information, but they do not know where to go to find it. This creates an opportunity for all agricultural communicators to make contact with the mainstream media, and in the case of the 2009 *Salmonella* outbreak, it worked.

Although they may not have realized it, the participants involved in this study were utilizing the excellence theory by responding to the public throughout the outbreak. The public relations practitioners used market trends; therefore, they were able to establish if their communications efforts were successful or if they needed make to adjustments, as suggested by Grunig (1992). While PCA was silent and sales plummeted, the public relations practitioners knew they had to step in and build back consumers confidence. Public relations can often help reduce uncertainty (Grunig, 1992), and it did in 2009 as peanut butter sales did not drop that year (D. Koehler, personal communication November 2, 2011).

## Recommendations

### For practitioners

Previous literature (Coombs, 2006) states that it is imperative for any organization to have a crisis communications plan in place. Palmer (2010) warned all agricultural organizations to be prepared and realize a crisis can occur. The APC had a crisis communication plan as well as media trained spokespersons that were able to handle the crisis communication.

The plan should be in place before any crisis occurs, but it should be flexible enough to be used

for various crises that might occur (Barton, 2001; Coombs, 2006). The team should know what their goal is as well as each individual's role in the case of a crisis. This will help to prevent confusion and a delay in response to a crisis (Barton, 2001; Coombs 2007a; Fearn-Banks, 2001).

Public relations practitioners need to establish a relationship with members of the media before a crisis. This is key to disseminating information quickly and accurately. Individuals in the agricultural industry are not always interviewed or contacted for information (Irlbeck, 2009); however, if the media are familiar with an organization, reporters will be more apt to contact them with questions or concern in light of a crisis (Fearn-Banks, 2001; Coombs, 2007a). This was confirmed by Cathy. Because they had already established a relationship with an AP reporter, they had more success in getting their stories published throughout the crisis.

To keep public relations practitioners up to date, market trends of the agricultural commodity at the center of the crisis should be sent to the crisis team and other relevant stakeholders on a regular basis during a crisis. Everyone can see how the efforts are making a difference in the way that consumers are buying and if they should do things differently.

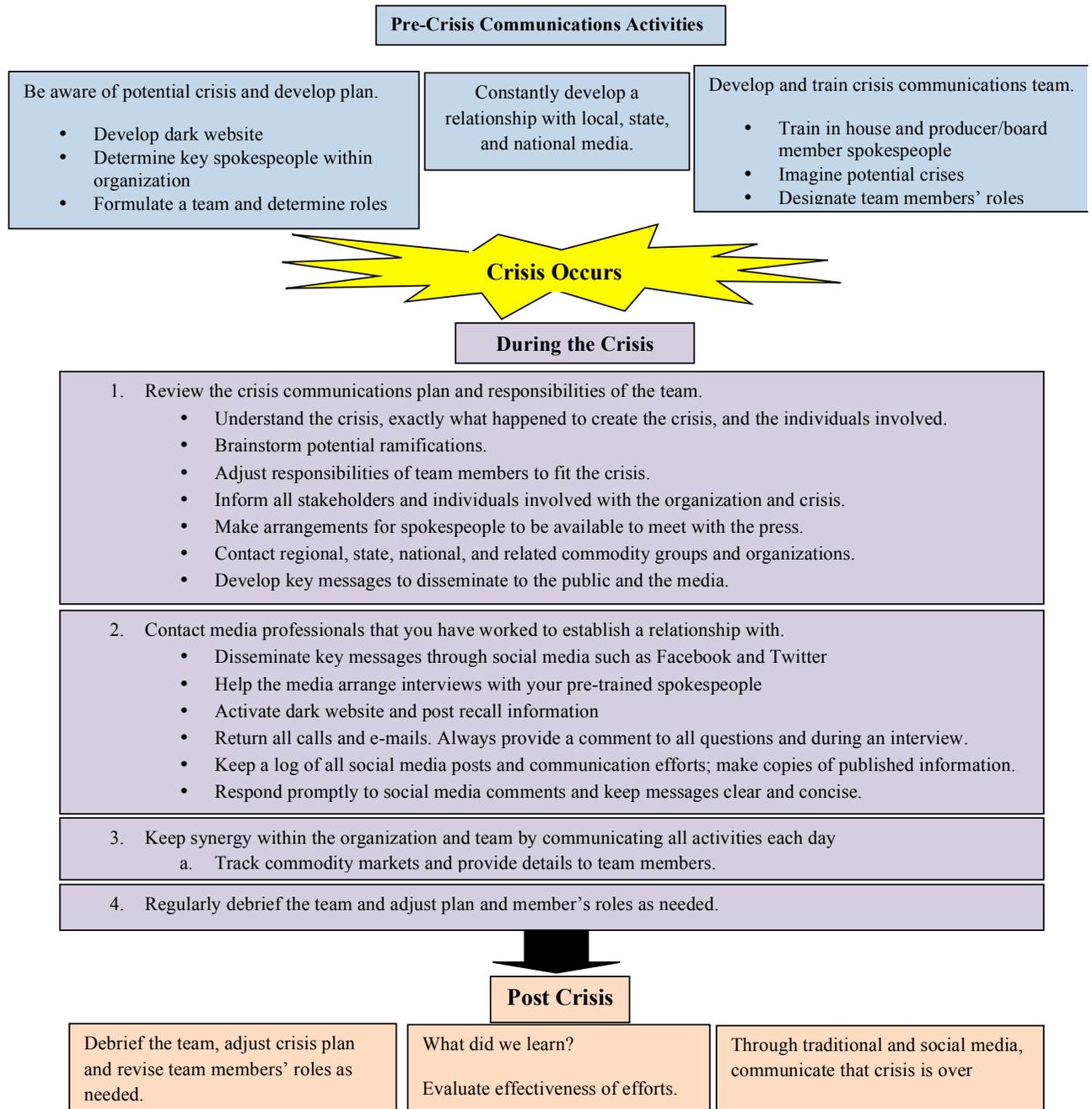
### **Steps to take during a crisis**

Previous literature from Barton (2001), Coombs (2007a), and Fearn-Banks (2001) suggested to practitioners the steps to take when creating a crisis plan; however, few sources explain what to do during an agricultural or food crisis. Using on previous literature and the data gleaned from this study, the researchers were able to create a pre-crisis, crisis, and post-crisis model for agricultural communications (see Figure 1). Some of the information has already been suggested (Barton, 2001; Coombs, 2007a; and Fearn-Banks, 2001), but a step-by-step model for pre, during, and post crisis specific to agricultural communications has not been proposed. For example, during a crisis, many reporters prefer to speak with an agricultural producer rather than an organization staff member. Regularly training the organization's key producers, board members, or officers helps to ensure they are prepared to address the media should a crisis arise. Also specific to agriculture during a crisis is working together with state, regional, or national commodity groups (when applicable) to create a unified message, field media inquiries, and inform each other of new information. In addition, working with related commodity groups (again, if applicable) could be helpful, depending on the crisis.

It should be noted that the peanut industry has a national organization that took leadership during the 2009 *Salmonella* outbreak; therefore, these suggested steps might be better utilized by a national agricultural organization. However, some of these conclusions could be helpful for any size or type of agricultural organization during a crisis. It is best to review and understand these steps during the crisis planning stage and to utilize the steps during and after a crisis.

### **For Future Research**

Participants in this study briefly mentioned how social media was just getting off the ground during the 2009 *Salmonella* outbreak. Future research could focus on the implementation of social media during a crisis and the effects that it has on consumers' confidence and loyalty once the crisis is over.



*Figure 1 Pre-Crisis, Crisis, and Post-Crisis Model for Agricultural Communications*

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