

... An Introduction To Food Risk Communication ...

The need for effective risk communication is becoming increasingly recognised by many Governments and the food industry. Although risk communication of food safety issues is still in its infancy, much can be learned from past experience. The European Food Information Council (EUFIC) aims to enhance communication between Government, the food industry and consumers. In this context EUFIC has started analysing how risk was communicated during the recent acrylamide food scare and has identified a number of lessons for the future. This paper provides an introduction to the subject, using the acrylamide alarm as a case study. Although the principles are based on this particular case study, many of them can be considered as general principles for risk communication.

INTRODUCTION

Risk communication is never easy. For over 30 years academics and practitioners have worked to develop a formula for risk communication and a practical tool for predicting how the public perceives risk. By and large, they have not been successful to date. Researchers have identified a series of variables that help determine the public perception of risk. These include:

Is a substance natural or synthetic? Is the risk seen as voluntary or involuntary? Is the individual or agency communicating the risk trustworthy or not? In fact trust is the most important variable identified so far and there is a strong correlation between high public trust in an organisation and low perceived risk and vice versa. However, despite these findings, developers still have problems siting noxious facilities, the public is still concerned about food issues such as genetically modified ingredients and regulators in many countries are finding it hard to regain public trust in the food supply.

WHAT IS SPECIAL ABOUT FOOD?

All foods carry an inherent degree of risk, whether produced conventionally or by alternative methods. As everyone needs food to survive we are forced to take risks every time we eat. People have learnt to avoid the obvious risks. For example cooking chicken and eggs reduces the risk of salmonella and vegetables are washed to ensure their cleanliness. Modern technological developments have also made our food safer including the pasteurisation of milk, advanced cleaning techniques at slaughterhouses and refrigeration. Increased analytical capacity and more sensitive techniques have also significantly reduced the risks of undesirable substances in our food. Despite being exposed to many new synthetic chemicals, food safety has improved enormously compared to 40 years ago.

PEOPLE MORE CONCERNED ABOUT FOOD RISK

Research shows that the public has become more concerned about food related risks than ever before. Even though society has become better at risk management, including food safety, the public's expectations of the food supply has risen so that people are increasingly worried, even by the smallest risks. For a long time food was exempt from this kind of anxiety, people were more likely to worry about living next to nuclear power plants, or being exposed to emissions from waste incinerators or coal power plants. This has changed significantly following a spate of recent food scares including salmonella in eggs, dioxin in Belgian chicken feed and BSE (mad cow disease) in the UK and other EU countries. Research on these and related events show that the majority of the public believes that regulators and the food industry did not do enough to address their concerns or keep their food supply safe.

At the same time, industry and regulators have been unable to convince the public that the world's food supply system has never been better controlled. For example, we have never had a food safety management system, including analytical methods and equipment, as comprehensive and sophisticated as we have today. If people do not believe that food regulators can control the food supply, they will inevitably be more concerned about the food they eat.

In an ideal world the public want elected policy makers and regulators to act on their behalf and protect them from food risks. Measures would include setting minimum safety standards and ensuring they are properly implemented throughout the food chain. But recent food safety scares have led to an inherent distrust of food regulators and the public have turned to other sources for food information. For example the UK Soil Association, a non-government organisation, has become perceived by the British public as a de facto food regulator for organic food. Any comments made by the Soil Association are quickly digested by the UK broad-sheets, further undermining the official food regulatory system.

MEDIA HAS BECOME MORE AGGRESSIVE

At the same time, the media has become more active in its reporting. Prior to the 1950s, the newsprint and radio media was no more than a tool used by policy makers to inform the masses about what they were doing. In most cases journalists passed the information on uncritically for fear of upsetting or losing their source of stories. These days, there are more and more news communication tools including the internet, 24 hour television, free newsletters and conventional sources. In this environment the media often helps shape the debate. A story may be presented from a number of different viewpoints, indirectly leading to public confusion, disillusionment and apathy. The recent spate of food scares has sensitised the media in this area. In Sweden, last year alone there were no less than six food scares, all gaining significant column inches in the tabloid press. These alarms raise public concern still further, and in some cases the public questions whether all food is in one way or another harmful.

MORE STAKEHOLDERS IN THE DEBATE

With the increased availability of information, there are more stakeholders participating in the policy debate. These stakeholders may include consumer groups, industry and environmental organisations, all with separate agendas. Often in this multi-

stakeholder environment, one party tries to discredit another aiming to reduce public trust in the opponent and gain public trust for themselves. However this strategy often fails because disagreements between the stakeholders are vividly reported in the news media leaving the public increasingly distrustful of everyone involved and unsure if anyone is telling the truth at all.

DEATH OF PUBLIC TRUST IN SCIENCE

Another factor is the death of public trust in science. In the past scientists were held above the various quarrels depicted in the media. But discussions of food safety crises underlining the uncertainties in science mean this is no longer the case. This is particularly true where scientists are asked by the media to make comments on one scare or another, which are then immediately refuted by another scientist. This so-called "scientific pluralism" leads to even greater public distrust of scientists.

COMMUNICATING SCIENTIFIC UNCERTAINTY

As science can now detect substances in foods down to parts per billion, scientists are moving away from understanding and communicating the more straightforward scientific conundrums to ones that are filled with uncertainty. This means we need to know what level of uncertainty the public are willing to tolerate. Research has shown that the public finds it difficult to differentiate between parts per billion and parts per million, making it very hard to explain certain risks. In many cases this leads the public to ask for zero risk. In addition many scientists do not have the necessary skills for communicating uncertainty, a task made even more difficult by the distrustful environment in which it has to be done.

FOOD ALSO PURCHASED FOR OTHERS

Food also has an added layer of complexity. Although food can be bought and consumed by an individual, in many cases one person may purchase food for a wider group of people for example during the weekly shop. These people may include children, elderly or disabled people who are at greater risk than the shopper. In these situations, the person takes on the added responsibility of providing safe food for his or her loved ones which can make them extra sensitive to potential food risks.

RISE OF THE BLAME CULTURE

Finally, there is a rise of the so-called blame culture. Increasingly the public also wants to find someone to blame for their various ailments. The rise of the blame culture is part of the growing trend toward individualism and is seen in the number of personal litigation cases coming through the courts in Europe (particularly the UK). Although it is still early days, there is a strong likelihood that this will also affect the food sector, as is already widely practised in the US.

BASIC LESSONS OF RISK COMMUNICATION

So how does one communicate those and other risks? There have been many books and information packs on how to communicate risks. One of the best was authored by Professor Ortwin Renn and colleagues. Drawing on this text and other food communication research, this position paper sets out key recommendations on food risk communication with particular reference to the recent case study by R. Löfstedt on acrylamide¹.

1. Know your target

It is vital that the regulator or industry body is clear about their target audience. Is it the concerned citizen, a stakeholder group, fellow regulators, other trade bodies, or a combination of these actors? In the acrylamide case there was confusion in this area. The authorities involved took a view that it was necessary to inform the consumer on new food safety matters whilst research scientists felt that the target should be science editors as the findings were scientific in nature and not necessarily newsworthy. Although this did not necessarily lead to conflicting messages per se, as in the end the press invitation reflected more the views of the Food Administration than the research scientists, it did lead to a press information vacuum that could have been avoided if they had agreed on the exact target.

2. Craft an appropriate message

It is very important to know the nature of the risks to be communicated. Are they technical or naturally occurring, are they voluntary or involuntary, are they familiar or unfamiliar? The message can then be crafted accordingly. It is also important to pick the most appropriate communication tool for disseminating the message. In doing so, one must also carefully weigh the costs (public concern), and benefits (public reassurance) associated with each communication method. The research findings on acrylamide were preliminary, and the link between acrylamide being formed naturally when cooking carbohydrates and humans getting cancer was at best tenuous. In this case, a press conference was called but it may have been more appropriate if the findings had been made public via a press or internet release. This release could have simply stated that preliminary research had shown that acrylamide may form in carbohydrates when they are cooked and that the authorities are examining the research findings and any possible implications for Swedish consumers closely.

3. Do not amplify risks or events

By amplifying risks that are by their nature perceived as attenuated (most food risks fall in this category), a communication strategy is bound to fail. Eventually the audience will see through any amplification and discard the message. Unnecessarily amplifying risks will be viewed as scare mongering and lead to public distrust in the source of the information. With regard to the acrylamide case, risks that by their nature would be seen as mild were amplified. Acrylamide forms naturally when carbohydrates are cooked and have been in food since humans discovered fire. By amplifying this naturally occurring risk the public quickly concluded there was little need to pay much attention to this food alarm.

4. Do not involve too many scientific bodies

Another possible route for conflicting messages is having too many parties involved. This can lead to inflexibility, leaks and miscommunication, all contributing to public misunderstanding. With regard to the acrylamide case different institutions were involved in crafting communication messages. One wanted a greater focus on the scientific content of the message and was keen to target scientific editors at the main Swedish newspapers. The other was more interested in promoting the newsworthiness of the story and wanted to target news editors. Because of this mismatch of aims and targets, the communication was worded in such a way that it led to a sensational press conference which amplified the risk. There was also a long time-lag between the press invitation and the press conference itself.



5. Proactive communication is best

The more a body communicates in a transparent fashion, the less likely that body will be accused of cover-up or secrecy. Proactive communication increases public trust and retroactive risk communication decreases it. On the other hand, communicating uncertainties when it is not necessary increases public confusion. With regard to the acrylamide scare, the purpose of the communication should have been to show that research had demonstrated a link between cooked food and acrylamide which may be hazardous to one's health and that the authorities would be examining the situation closely. There should not have been a media debate as to whether substances that are tested as carcinogenic on rodents are also carcinogenic on humans. This is an ongoing scientific debate between the toxicologists and the epidemiologists that should be carried out in the peer reviewed literature and not in leading newspapers. The very public scientific debate distorted the message that authorities involved wanted to convey.

6. Disclosure of all the detail is not always helpful

Disclosure of all the detailed findings is not always the solution in risk communication crises. Although transparency is seen as a necessary tool to show the public that decisions are not taken behind closed doors (e.g. some countries or EU regulatory meetings have the minutes of their meetings put virtually immediately on the internet), it is not always the right solution. Indeed, transparency can show how complicated the decision-making process can be, based on scientific uncertainty rather than certainty. With regard to the acrylamide scare, by focusing part of the press conference on whether the toxicological results indicating that acrylamide is a proven carcinogen on mice and rats can be transferable to humans, the public became confused, leading to greater public distrust of both regulators and scientists.

7. Avoid mentioning brands

Brand communication inevitably affects a company's performance on the stock markets, particularly when it is negative. It may also make food safety a competitive advantage. In the long term this may be detrimental as it may discourage the collaboration and sharing of information necessary for improving food safety. It may of course be necessary for regulators to mention a brand when a potentially hazardous product must be recalled. This was not the case for acrylamide. Authorities were not advising consumers to reject any specific food or product. As a matter of fact, consumers were advised not to change their dietary habits. Brand communication in this case did not add value to the management of food safety, particularly considering that the level of acrylamide varied greatly within the same brand.

8. Make friends with the media

One way of addressing this issue is to proactively seek media contact by targeting specific editors and informing them on an informal basis about ongoing work. With regard to the acrylamide scare, putting forward a press invitation some 18 hours before the press conference itself and then not responding to the journalists' numerous questions in the run-up to the press conference caused unnecessary media hostility. Journalists were unhappy that the press officers at both institutions had refused to take their phone calls. Had the institutions involved cooperated with the media prior to the press conference, media hostility might have been less.

9. Understand the importance of a trusted source

A more trusted communication source will inevitably get more media attention than a less trusted one. In the case of acrylamide, the case received so much national and international media attention because the institutions communicating the findings were highly trusted. As one observer put it – 'had the findings been put forward by a non-trusted body, no one would have noticed'

10. Experience is vital when dealing with the media

It is important to have experience or hire appropriate expertise when conducting media briefings, press conferences, etc. If you have little experience outsource to a competent public relations firm. In ideal circumstances, especially with regard to contentious issues, both the press invitation and the press conference should be pre-tested. If this had been done in the acrylamide case, perhaps the press invitation would have been changed, or the press conference itself could have flowed better.

11. Avoid creating a communication vacuum

Risk communication vacuums lead to rumour and speculation. To prevent this, hold press conferences as close to the release of the press invitation as possible. Two to four hours between press invitation and the press conference is accepted practice. With regard to the acrylamide scare, there was an eighteen hour communication vacuum, which led to media hostility and widespread rumour and speculation.

CONCLUSIONS

During the last few years, different food safety crises have highlighted the importance of good risk communication. There is no such thing as risk-free food which means that risk communication should be a major aspect of food safety management. Within Europe risk communication has been made increasingly difficult due to a greater public distrust of both regulators and the food industry. At the same time risks have been amplified in the media, and there is a growth in the so-called blame culture. It is hoped that lessons learned from the analysis of the acrylamide case can contribute to better risk communication in the future.

REFERENCES

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