What are the important issues around food safety and nutrition? Findings from a media analysis and qualitative study of consumer trust.

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RESEARCH

Please cite this paper as: Henderson J, Ward PR, Coveney J, Meyer SB. What are the important issues around food safety and nutrition? Findings from a media analysis and qualitative study of consumer trust. AMJ 2010, 1, 2, 164-169. Doi 10.4066/AMJ.2010.202

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Abstract

Background

The increased focus on the prevention of illness and the promotion of health and wellbeing creates new and exciting opportunities for health care professionals to engage with their patients. One such area of engagement is around food safety and nutrition, given the central importance of these to maintenance of health. In order to enhance meaningful engagement with patients, health care professionals need to be aware of the messages that their patients are currently receiving from the media about food safety and nutrition, and also the general awareness and perceptions of these issues within the lay populace. This paper presents an analysis of media stories and interviews with consumers.

Method

Media stories were analysed for five Australian newspapers from January 2006 to June 30th 2008 for all articles relating to food and trust except letters to the editor. All articles were then subject to discourse analysis. In addition, interviews were undertaken with 47 participants.

Results

The most prevalent media stories about regulatory strategies for addressing childhood obesity (16.7%, N=120 articles). Stories about the contamination of food, either by bacteria or foreign objects was the second most prevalent theme (14.9%, N=107), followed by stories about the regulation of GM food (13.9%, N=100 articles). The qualitative findings highlight the high levels of trust in the Australian food supply and food safety regulation, but low levels of trust in media reporting around food safety and diet. For some people, the media reporting lead to confusion around food safety and diet issues.

Discussion

Confusion about, and rejection of, media messages about healthy eating have the potential to contribute to the development of chronic illness through a failure to adopt lifestyle changes. Furthermore, it may inhibit the seeking of appropriate information by people with chronic illness. Given a growing emphasis upon primary care and health literacy, health care professionals need to be aware of the messages that their patients receive.

Key Words

Primary health, food safety, nutrition, media, qualitative research

Background

Australia has moved towards a more extensive delivery of primary health care, through a process of re-orienting health policy and practice towards the prevention, rather than solely on the treatment and on-going management of illness and disease.¹ A move towards primary health care has been supported by changes to the Medicare Benefits Schemes through the Enhanced Primary Care Scheme to cover health checks, management plans for chronically ill patients and case conferencing with allied health workers,²⁻⁵ with additional changes effective from 1 May 2010 to support longer consultations.⁶ The Rudd government since election in November 2007 has signaled commitment to primary care through the its establishment of taskforces to develop a National Primary Health Care Strategy and National Preventative Health Strategy.¹ As part of this, a discussion paper, *Towards a* National Primary Health Care Strategy, was published in 2008 calling for patient-centered care supported by improved health literacy about, and self-management of chronic illness and a stronger focus on wellness, prevention and early detection, to reduce the incidence of chronic illness.^{1,2}

The main purpose of this paper is to situate the roles of health care professional within a broader framework of food and nutrition. Given the importance of nutrition within the prevention of illness and promotion of health and wellbeing, health care professionals have a large role to play in advising patients about food safety and diet and referring some patients for specialized consultations. However, in order to advise and provide appropriate



consultation on food safety and diet, health care professionals need to understand the current messages provided to consumers (via the media) and also consumers' general awareness and perception of issues around diet and food safety. It is to these points that the paper now turns.

The roles of health care professionals and the media in providing information about food safety and diet

GPs are an important component of primary health services.⁷ Coote argues that the government initiatives in the last 20 years in the form of funding and regulatory changes, have moved general practitioners from autonomous practice to becoming part of the broader health care system.⁴ With changes in care delivery and movement towards primary care there is evidence of increasing expectations of GPs by patients. Pettigrew et al found that older patients want GPs to provide timely referral to specialists and other health practitioners, and to have current knowledge of medical developments and awareness of patient history⁸ while Lawn et al. found that patients with chronic illness wanted more holistic and patient-centered care.⁹

Diet is an important component of the management and prevention of chronic illness given the central role played by food choice and diet in the prevention and development of many major chronic diseases such as cardiovascular disease, type 2 diabetes, and some cancers.¹⁰ A number of recent studies have demonstrated that consumers have many misconceptions about what constitutes health risk and healthy eating.¹¹⁻¹⁵ Food experts believe that the public under-assesses the risk associated with some microbiological hazards and over-assesses the risk associated with other hazards such as genetically modified organisms and bovine spongiform encephalopathy.¹¹ Consumers confront increasing amounts of information on food every day and in response, simplify food choice through coping strategies such as avoiding and favouring foods; vigilance; actively seeking and using food safety information; moderation and variety; common sense based upon previous personal experience or the experiences of significant others; or lack of concern.¹² Scientific evidence is often rejected leading to behaviour that has the potential to damage health.¹³ In practice, food choice is not only driven by health concerns but also by routine; personal food preference; ethics; food cost; convenience and access; and by previous experience.¹⁴⁻¹⁵

The media is a significant source of information about food.¹² Kitzinger et al. argue that the media does not however, provide an adequate avenue for information about food risks as reporting depends upon the perceived newsworthiness of stories. Food stories attract attention when there are decisive scientific statements, disasters, fresh human interest stories, official reactions and conflict over the level of danger experienced. Risk by its nature is often poorly defined, can be ignored and involves projected outcomes ensuring that health risks are poorly reported by the media.¹⁶ Despite the inadequacies of media reporting of food issues and lack of trust in the media, there is evidence that the media impacts upon the attitudes and behaviors of readers. Frewer et al found a relationship between the volume of media reporting and people's perception of risk¹⁷, Bauer, in a longitudinal studies of attitude towards biotechnologies, found a convergence of the values of readers of elite press with media presentations over time¹⁸ and more recently McMahon et al. found that acceptance of and trust in 'scientific' messages in the media depends upon regular exposure to these messages.¹⁹

While trust in media reporting of food issues is limited, medical professionals are considered a reliable source of information about food risks and healthy eating.²⁰⁻²² GPs have a role to play in the provision of accurate information about diet and its impact upon health. GPs need to be aware of information received from other sources, such as the media, which may undermine health literacy and contribute to unhealthy behaviours. This paper explores two aspects of media reporting: the food issues reported in the Australian media and audience reception of the food information they receive through the media. This data will be explored in light of moves towards primary care and an increasing role for GPs in preventing chronic illness

Method

The data for this paper comes from two sources: firstly from five Australian newspapers The Australian, The Age, The Advertiser, The Australian Financial Review and The Sydney Morning Herald. A media search was conducted via Factiva, a database which provides full-text access to Australian newspapers, using the search term "food" for the period from Jan 2006 to June 30th 2008 for all articles relating to food and trust except letters to the editor. The inclusion criteria for the study were: articles addressing level of confidence in the quality and safety of food, in the food system, food producers and retailers or in food governance. The search elicited a total of 717 articles in all. The articles were subject to content analysis resulting in identification of 8 themes, pertaining to childhood obesity, food contamination, GM food, food labelling, organic food, risky foods, food regulation and other articles. The articles were then mapped via theme across the timeframe to enable the identification of peaks and troughs in reporting in relation to key events.

A second source of data is 44 semi-structured interviews with 47 participants (3 interviews were conducted with couples). Participants were aged between 18 and 65 years and chosen on the basis of being the primary shopper for the household as earlier research suggests that these people are more likely to consider the safety and quality of their food.²³ The study used purposive sampling techniques to attract participants who are information rich.²⁴ Information richness is identified by Popay *et al.* as a marker of quality in qualitative research.²⁵ The sample was structured by location, age and gender with participants sought from high SES, low SES and rural locations. Ethics approval for this project was gained through the Flinders University Social and Behavioural Ethics Committee.



The interviews were of approximately one hour duration and addressed issues of food choice; information about food; food safety; governance of food; trust in institutions and level of trust in food. The data for this paper is primarily drawn from discussion of media reporting of food risk. The interviews were audio-taped and transcribed verbatim. Data were analysed using techniques from grounded theory, which seeks to provide a depiction of reality through allowing the theory to emerge from the data.²⁶ The data were initially coded using open codes which identify concepts and their properties and later subject to axial coding which makes conceptual links between the concepts.²⁶

Results

Media analysis

Table 1 shows the number and percentage of articles published for each theme between January 2006 and June 2008. The most prevalent theme relates to regulatory strategies for addressing childhood obesity (16.7%, N=120 articles). Two strategies were covered in the media: the regulation of fast food advertising to children and the banning of junk food from school canteens. Concerns about the contamination of food, either by bacteria or foreign objects was the second most prevalent theme (14.9%, N=107). The reporting of food contamination centres on the breakdown of infection control and regulatory mechanisms. The regulation of GM food was another prevalent theme in the media at this time (13.9%, N=100 articles) reflecting debate about the lifting of a moratorium on the growth of GM canola by New South Wales and Victoria and ongoing debate in South and Western Other themes identified in this study include Australia. debate about the responsibilities for and adequacy of food regulation (12.7%), risky foods (12.4%), food labeling (10.2%) and organic food (9.1%).

Figure 1 maps the reporting of the three most prevalent issues across the 30 months that data was collected. Regulation of childhood obesity was evident throughout the 30 months studied with peaks in reporting in July 2006 (N=12) and April 2008 (N=9) concurrent with the release of advertising industry codes for practice which address the regulation of fast food advertising to children. Food contamination was also reported throughout the 30 month period however, there were two peaks in reporting in April 2007 (N=23) and June 2008 (N=17) in response to high profile cases in Victoria and South Australia involving the death of residents in aged care facilities from food poisoning. Reporting of GM foods in contrast centres on one peak in reporting in November 2007 (N=22) when the moratorium on GM crops was lifted resulting in widespread debate in the media about the benefits and liabilities of GM foods.

Interviews

The participants in this study generally displayed a high level of trust in the food supply. One younger woman exemplifies this belief stating that "[o]verall I assume that it's fairly safe all the time. Yeah I probably I would always assume that it's safe" (L8). Other participants quantify their level of trust. An older woman observes "I would say I'm 90 percent happy with trusting what I've purchased" (J25). For others trust is taken for granted. A rural male who is responsible for the family shopping states "I'd be very confident yes. I wouldn't be buying food and feeling like 'oh, I'm not sure about this' sort of thing" (J42).

When questioned as to why they perceive Australian food to be safe, participants cite the rigour of Australian food standards; general cleanliness of the environment and a lack of personal bad experience and exposure to major food scares. A male from a low SES community states for example, that:

...unless you've got a reason, not to trust, like you've had an experience or you've, you know, something has happened, then, I think then perhaps you wouldn't trust them, but I always grew up that you trust things until there's a reason not to (L4).

Participants were also asked to comment upon their level of trust in food information received through the media. While participants identified some trusted media sources such as the ABC television, radio stations and websites and broadsheet newspapers, they generally expressed little trust in food reporting in the media. This perspective is exemplified by a younger woman from the eastern suburbs who states that "I tend to trust the likes of the ABC and some of the established papers like *The Australian*, whereas the other ones that are more commercial..." (J18) A common response to the information received is reflection upon conflicting messages about the healthiness of food. This view is exemplified by an older woman who states:

You can't believe a thing you read in the paper because you know everyday there's different story. You know one day they'll tell you that something is bad for you and the next day it's good for you (J17)

This leads to confusion as to what foods to eat. A male from the eastern suburbs notes for example, that "with these people saying 'this is bad, that is good' ... it's just a confusing time" (J26). Others feel overwhelmed by the volume of information received. A mother of young children notes that "I don't trust myself as much as I'd like to because of all this extra information that - I think it sometimes inhibits our ability to do some things like parent and prepare food and all sorts of things" (J30).

Furthermore, media reporting often conflicts with commonsense understandings of what constitutes healthy eating. A rural participant states for example: "10 years ago they were saying eggs were terrible for you and today they're starting to say again they're one of the best foods for you."(J42) Confusion has the potential to undermine treatment regimes as people with chronic illness seek appropriate information to maintain health. This point is exemplified by the following quote from a participant with a history of cancer who states:

...there's so many things about you know, food causing cancer. One of the things I have a problem with is, is the way they test things so there might be something in, at one stage it was cabbage caused cancer (J9).

Respondents adopt a number of different responses to confusion about food and healthy eating. Some reject media information. A younger male respondent says for example that :

"They're telling us all this stuff – bad stuff – about food but you go back a few years before this hype and we were still eating it ...back then, they were happy with all the stuff they ate. They didn't have all this crap about high cholesterol or high sugar intake and everything." (J26).

Others adopt a wait and see approach. An older participant who had a history of cancer states that media reporting says: "you shouldn't have this for cancer and you shouldn't have that. Well, okay. Let's wait and see what happens down the track." (J20) For others the solution is found in commonsense with participants opting to "buy what we believe is healthy" (J1) and using their own judgment as to what constitutes a healthy diet. This view is exemplified by a mother of young children who states that: "I figure as long as my kids have fruit and that, and don't have hardly any of that stuff [food high in fat], it's all good." (J38)

Discussion

An analysis of media reporting of articles related to trust in food demonstrate that the issues most likely to attract media attention are those pertaining to emerging public health issues such as childhood obesity (16.7%) or reporting of food contamination incidents, particularly in aged care facilities (14.9%). GM food also received media attention at this time due to changes in legislation surrounding GM crops (13.9%). Only 89 articles (12.4%) addressed healthy eating. This contrasts with previous findings where obesity, particularly in children accounted for 47% of articles and food contamination accounted for 16%. $^{\rm 27}$ The dominance of these particular stories may reflect their newsworthiness. For Conrad²⁸ "newsworthiness is a negotiated phenomenon." (p.141). Sources manage media content to present themselves in the best light while journalists manage their sources to get the information they want.²⁹ As a consequence, the information presented may not be an accurate reflection of the degree of risk posed to the reader by food safety and nutrition issues.

Despite a media focus upon more sensational food stories, and contrary to de Boer et al, when questioned about media reporting of food, participants most commonly addressed media reporting of healthy eating rather than food safety concerns suggesting that this is the issue of concern for the participants.¹¹ Participants in this study express trust in the food system but distrust of media reporting of food issues. In general, they describe being confused by the volume of information received and by contradictory messages about the healthiness of food. Furthermore, media reporting often contradicts commonsense understandings of what is healthy. In response, participants adopt strategies such as rejecting health messages, deferring judgment or relying upon their own judgment as to what constitutes a healthy diet, reflecting findings from similar studies.^{12, 14-15}

This data suggests that the participants are interested in, and are seeking dietary information. The literature suggests that

GPs are not only considered a reliable source of information about the impact of diet and nutrition on chronic illness.²⁰⁻²² but that patients also have increasing expectations of the role of GPs in relation to management of chronic illness.⁸⁻⁹ As such, there is a need for GPs to be aware of the food messages that patients receive through the media and the behavioural impact these messages have upon them.

Conclusion

Confusion about, and rejection of, media messages about healthy eating potentially contribute to the development of chronic illness through a failure to adopt lifestyle changes. Furthermore, confusion may inhibit the seeking of appropriate information by people with chronic illness. Given a growing emphasis upon primary care and health literacy, GPs need to be aware of the messages that their patients receive about food and nutrition.

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ACKNOWLEDGEMENTS

The authors would like to thank Trish Clark for support with referencing, and formatting and Louise Holmberg who conducted interviews with younger participants. We would also like to thank Associate Professor Anne Taylor for advice and constructive comments on the study which this paper is based. The data is drawn from and ARC funded project on Food & Trust.

PEER REVIEW

Not commissioned. Externally peer reviewed

CONFLICTS OF INTEREST

The authors declare that they have no competing interests

Figures and Tables

Table 1: Major themes from Australian print media reportingof food and trust 2006-June 2008

Topic Childhood obesity		N 120	% 16.7
obesity	Banning junk food ads Banning junk food from school canteens	100 20	13.9 2.8
Food contamination		107	14.9
containination	Food poisoning	86	12.0
	Foreign objects in food	21	2.9
GM food		100	13.9
Regulation		91	12.7
	Food hygiene inspections	30	4.2
	Export/trade/quarantine	31	4.3
	Standards for food producers	16	2.2
	Calls for taxation of fast foods	9	1.3
	Obesity checks in schools	3	0.4
	Duplication of regulation	3	0.4
Risky foods		89	12.4
•	Trans fats	31	4.3
	Fish/seafood	22	3.1
	Chicken/poultry	6	0.8
	Meat	6	0.8
	Other (food additives, cheese, eggs, sweeteners, breakfast cereal)	23	3.2
Food Labelling		73	10.2
Organic food		65	9.1
Other articles		72	10.0
	Food safety information	8	1.1
	Rising food prices	16	2.2
	Critiques of role of big	6	0.8
	business Functional foods/ food additives	13	1.8
	Others	29	4.0
Total		717	100

Figure 1: Media reporting of the three most prominent food issues January 2006-June 2008.

