

Taking the Risk out of Risk Communication

降低 ‘风险交流’ 失败的风险

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Two of the elements of Risk Analysis, Risk Assessment and Risk Management, are benefiting hugely from improved methodologies, more sensitive analytical capabilities, rapid diagnostics, bioinformatics, process interventions, stricter regulations, more robust enforcement, enhanced surveillance and early warning systems and greater international collaboration.

风险分析的前两个方面——风险评估和风险管理都正受益于技术的进步，比如更灵敏的分析技术、快速诊断、生物信息学、过程干预、更严苛的法规、更有力的法规实施、有效的监控和快速预警系统，以及更广泛的国际合作。

However the third element, Risk Communication, still remains challenging and hasn't maximized the progress to be gained from the transformation occurring in the communication landscape.

风险分析的第三个方面——风险沟通，仍面对巨大挑战，还没有完全跟上媒体结构变化的步伐（比如社交媒体和自媒体的蓬勃发展）。



One of the difficulties in Food Safety is communication of the issues to the public without undermining consumer confidence in:

食品安全的一个难点是在不损害消费者信心的情况下和公众沟通问题：

1.The safety of the food supply

食品供应链的安全性

2. The ability of the regulatory agencies to police the food chain

监管机构监管食物链的能力

3. The commitment of the food industry to produce safe food

食品工业致力于生产安全食品



The word **Risk** in most languages generates fear and anxiety amongst consumers:

大多数语言中的“风险”一词都会在消费者中引起恐惧和焦虑：

Risk is deemed a bad thing

风险被认为是一件坏事



Currently in many jurisdictions; "Risk" Communication is seen to be:

目前在许多司法管辖区,“风险”沟通被视为:

1.undermining consumer confidence

破坏消费者信心

2.making consumers more anxious about food

3.

让消费者们对食物更加焦虑

3.making consumers increasingly angry with the authorities for not resolving the situation

让消费者越来越不满意当局,觉得他们没有解决问题



A man with short brown hair, wearing a dark pinstriped suit, a light blue shirt, and a dark tie, is speaking at a podium. He is looking slightly to his right. A microphone is positioned in front of him. In the background, there is a whiteboard with some text on it.

Communication is a two-way process yet the food safety professionals regularly label one-way dissemination of information as communication

沟通应该是双向的，然而食品安全从业人士经常把单向的信息传播称为沟通。

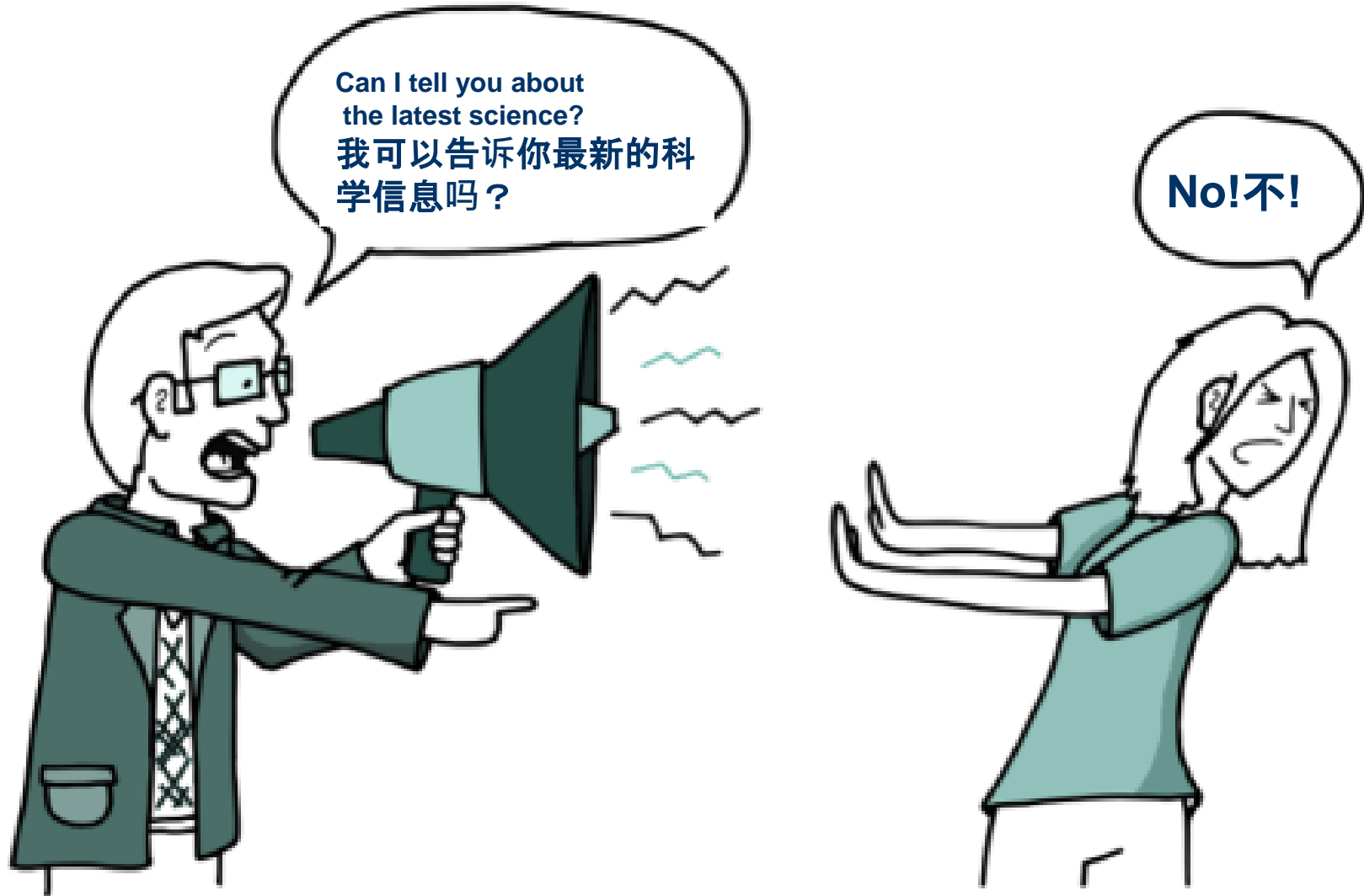
Much exciting innovative research outputs in the food area will never realize their full potential without consumer acceptability

如果没有消费者认可，很多让人兴奋的食品科技创新都难以实现潜在价值

- GMOs 转基因技术
- Gene editing 基因编辑技术
- Nanotechnology 纳米技术
- Lab-grown meat 人造肉



Could we make new science exciting? 我们能让新科学变得令人兴奋吗?



在社交媒体方面，我们有很多可以去做的工作，从而快速地进行大量的交流。但这需要很多资源



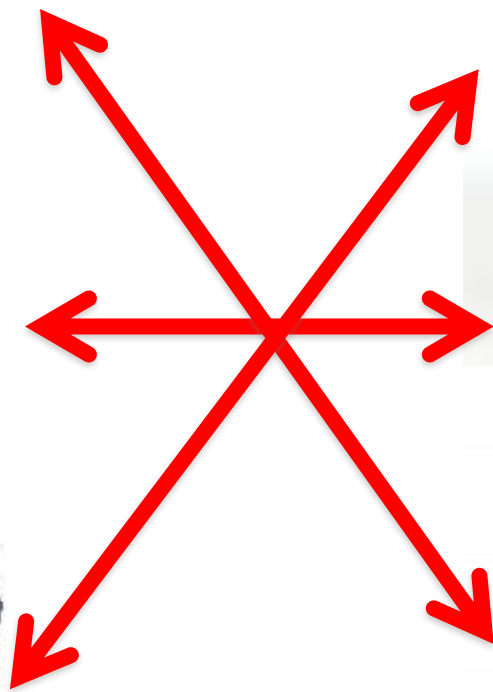
Even very young children are now using the internet
即使很小的孩子现在也在使用互联网



Here is the 82 year old grandfather of one of my students using wechat 我一个中国学生的82岁的爷爷在使用微信



怎样的混合交流渠道最合适—— 传统媒体，社交媒体以及其它



We are trialing using the digital media to engage with consumers to monitor their views which will be much faster than face to face or postal questionnaires

我们正在尝试使用新媒体来与消费者互动，来了解他们的看法，这比面对面或邮寄问卷都要快得多。

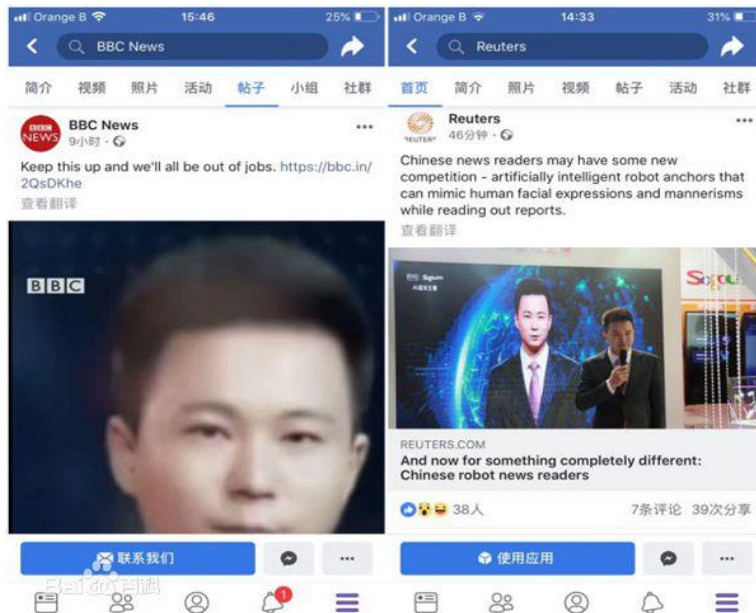


China has entered the 'smart media' era 中国已经进入‘智媒体’时代



Traditional media 传统媒体 → new media 新媒体 → smart media 智媒体

- Robots write quick news, artificial intelligence (AI) based TV hosts
- 机器人短新闻写作，两会期间全球首个“AI合成主播”
- Personalized messaging, information tailored to each individual's preference 根据用户偏好的定制化信息推送



In collaboration with 5 research institutions, CFSA and UCD initiated 8 studies: how to increase consumer confidence in food safety in the era of smart media

CFSA, UCD 和中国及欧洲的5家院校合作，开启了8项研究：在智媒体形式下，如何提高消费者食品安全的信心



PEKING
UNIVERSITY



Queen's University
Belfast

国家食品安全风险评估中心
China National Center for Food Safety Risk Assessment



北京師範大學
BEIJING NORMAL UNIVERSITY



Study 1: Understanding stakeholders' communication needs in relation to the establishment of consumer confidence (ongoing)

研究1: 了解在建立消费者食安信心方面, 各方的信息沟通需求 (进行中)

Interviews with consumers, food regulators, and people from the food industry

采访消费者, 食品监管者及食品企业相关人员



Study 2: Consumer infant formula survey

研究2: 关于婴幼儿奶粉的消费者调查



和婴幼儿疾病相关的负面报道往往会造成长久的不良影响




这是一张悉尼机场面向中国旅客的奶粉免税店的图片

消费者对中国婴幼儿奶粉的信心至今还没有摆脱2008年三聚氰胺事件的影响



这是一项富有挑战性的工作，如何告诉中国妈妈“国内婴儿配方乳粉的生产标准和进口品牌是一致的”。





2017年，法国一家婴幼儿配方奶粉工厂的沙门氏菌爆发导致39名婴儿生病

In 2017 a *Salmonella agona* outbreak associated with PIF from a factory in France resulted in 39 infants falling ill

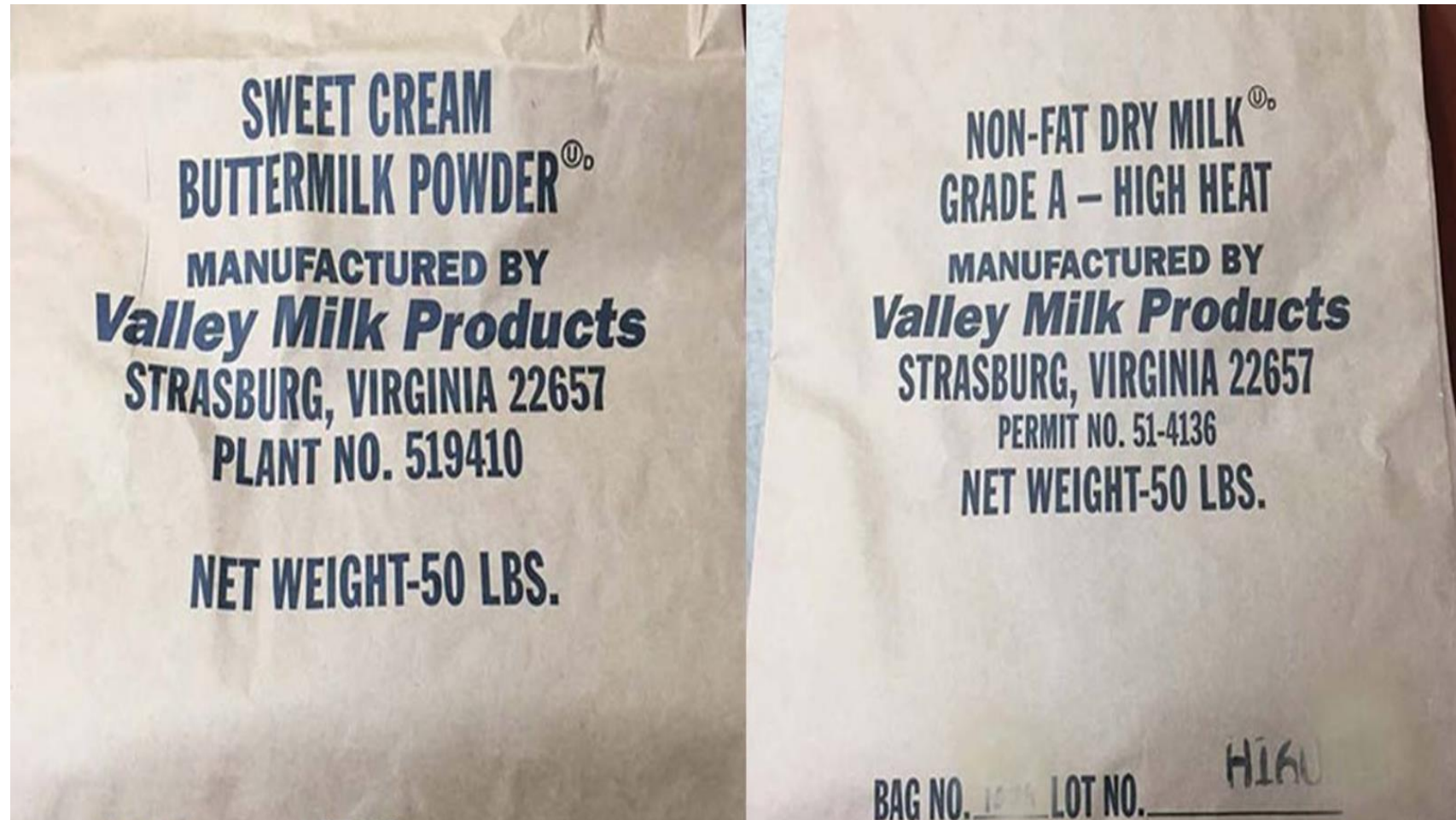
产品从13个欧盟成员国和欧盟以外的54个国家召回



Product was withdrawn from 13 EU Member States and 54 countries outside the EU



2016年美国食品药品监督管理局(FDA)召回了Valley Milk LLC公司 1800吨的奶粉, 因为FDA在厂房和产品中都发现了沙门氏菌。



In 2016 in the US the FDA initiated a recall of 1,800 tons of milk powders produced at a Valley Milk LLC facility in the USA after the identification of *Salmonella meleagridis* in the factory environment and in product.



Study 2: Consumer infant formula survey

研究2: 关于婴幼儿奶粉的消费者调查

We found mothers' confidence in and satisfaction with imported vs. domestically produced infant formula were not that much different any more

我们发现，妈妈对国产奶粉和进口奶粉的信心及满意度差异已经不大了



Study 3: A comprehensive survey on public's food safety perception and their views on food traceability (data collected).

研究3: 公众食品安全感知, 及对食品追溯看法的调查(数据收集完毕)



Study 4: Moving from food risk communication to food information communication (published)

研究4: 从狭义的食品风险交流 扩展到 广义的食品信息交流 (已发表)

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PERSPECTIVE OPEN

Moving from risk communication to food information communication and consumer engagement

Patrick G. Wall¹ and Junshi Chen²

Consumers in most developed countries have greater access to safer food than ever before, yet the issue of consumer perception on the safety of the food supply, the control infrastructure and existing and new process technologies is often not positive. A series of high profile food incidents, which have been ineffectively managed by both the regulators and the industry, and where there has been a failure to be open and transparent, have sensitised a proportion of consumers to scary stories about the food supply. There has been concomitant damage to consumer confidence in (i) the safety of food, (ii) the food industry's commitment to producing safe food and (iii) the authorities' ability to oversee the food chain. Threats to consumers' health and their genuine concerns have to be addressed with effective risk management and the protection of public health has to be paramount. Dealing with incorrect fears and misperceptions of risk has also to be addressed but achieving this is very difficult. The competencies of social scientists are needed to assist in gaining insights into consumer perceptions of risk, consumer behaviour and the determinants of trust. Conventional risk communication will not succeed on its own and more innovative and creative communication strategies are needed to engage with consumers using all available media channels in an open and transparent way. The digital media affords the opportunity to revolutionise engagement with consumers on food safety and nutrition-related issues.

npj Science of Food (2018)2:21 ; <https://doi.org/10.1038/s41538-018-0031-7>

INTRODUCTION

The public health consequences of contaminated food cannot be underestimated and foodborne diseases are an important cause of morbidity and mortality globally. Food safety cannot be taken for granted and when things go wrong people get ill and some will die. There is no shortage of high profile serious outbreaks to keep a proportion of consumers anxious about food safety. An outbreak of *Listeria monocytogenes* in 2017 and 2018 in South Africa, linked

safety infrastructure. Many have introduced stronger food legislation with a greater emphasis on independent risk assessment, robust risk management, and open and transparent risk communication. Greater emphasis has been placed on the responsibility of the industry stakeholders, at all stages of the food chain, to produce safe food.⁶ The Food Safety Modernisation Act was enacted in the US in 2011 and the Safe Food for Canadians Act was introduced in 2012 and is being updated in 2018.⁷ The EU introduced radical reforms in response to the BSF

Nature Partner Journal

Wall, P., Chen, J. (2018) Moving from risk communication to food information communication and consumer engagement. *Science of Food*, 2:21-25.



食品信息交流涉及广泛的主题，包括

- i) 食品和新技术的益处和积极性;
- ii) 政府正在加强努力和措施，以改进食品监测系统并确保合规;
- iii) 食品行业为提高食品质量和安全所做的努力;
- iv) 食品的健康益处;
- v) 健康饮食以及如何避免健康损害和不健康饮食引起的疾病;
- vi) 如何在商业厨房和家中妥善处理 and 烹饪食物，以避免食源性疾病。
- vii) 食品中的潜在风险和危害
- viii) 在污染事件，食物中毒爆发和召回期间及时交流信息



Study 5: The potential of digital marketing communication technologies in food safety communication

研究5：数码营销技术在食品安全信息沟通方面的应用价值

一篇综述文章以及在审
An paper under review



Quiz based WeChat
mini-program
Are you ready for
cooking ?
食安测试微信小程序



WeChat-based mini
game – ‘Secret
behind foods’
食安科普微信小游
戏



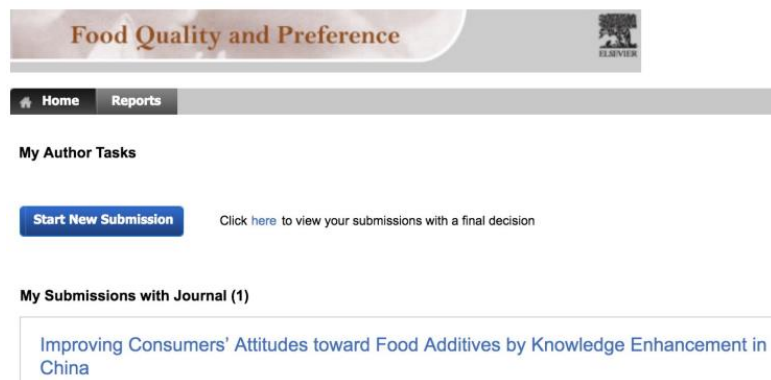
Study 6: Developing communication strategies based on the psychological characteristics of Chinese consumers

研究6：基于中国民众的认知特征设计交流策略

Taking account into Chinese consumers' psychological and cognitive characteristics when designing the communication strategy

基于民众的认知规律设计交流策略，包括情绪应对优先，关注点一致等

行政管理改革 2019 · 1
政府管理创新



The screenshot shows the top navigation bar of the 'Food Quality and Preference' journal website. It includes a 'Home' button and a 'Reports' button. Below the navigation bar, there is a section titled 'My Author Tasks' with a 'Start New Submission' button and a link to view submissions. Another section, 'My Submissions with Journal (1)', lists a submission titled 'Improving Consumers' Attitudes toward Food Additives by Knowledge Enhancement in China'.

我国食品安全保障体系的新痛点及治理策略

陈 思 罗云波 李 宁 吴永宁 吴广枫

摘 要 食品安全具有客观食品安全和主观食品安全两个层面。要真正解决食品安全问题，让民众放心，仅仅保障客观食品安全是不够的。当前我国客观食品安全的提升难以转化为主观食品安全的问题突出，已经成为食品安全保障体系的新痛点。需要改变理念，将主观食品安全作为食品安全治理的最终落脚点；改变策略，加强风险交流学科建设，强化公众风险感知研究，为有效交流提供技术支持；改变模式，针对受众的感性系统设计交流策略，进而促进受众理性认知系统的启动。

关键词 主观食品安全；客观食品安全；食品安全信心与信任；风险交流

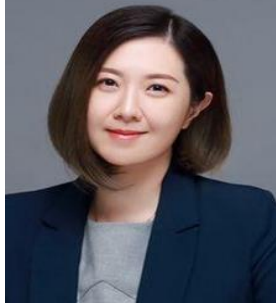
【中图分类号】D63

【文献标识码】A



The real exciting opportunity is to use the mobile devices to seek consumer's views and then in real time give them back customised accurate information tailored for their age, gender and educational status
真正令人兴奋的机会是使用手机移动设备寻求消费者的观点，然后实时为他们提供针对他们的年龄、性别和教育状况量身定制的准确信息





Dr Si Chen has developed an educational app on food preparation

陈思博士开发了一个关于食物准备过程的教育应用程序



Communication is a two-way process and the digital media affords us the opportunity to gain insight into consumers concerns about food safety and tailor our messages to address their needs.

沟通是一个双向的过程，数字媒体使我们有机会深入了解消费者对食品安全的关注，并根据他们的需求定制我们的信息



Dr Si Chen
CFSA



Study 7: An experiment to compare two communication strategies in relation to domestically produced infant formula (ongoing)

研究 7: 实验测试提高消费者对国产奶粉信心的两种交流策略



Study 8: Survey on consumer knowledge and preferences for different types of infant formula products

研究8：调查消费者对四种奶粉产品的了解程度及偏好

1.Domestic produced infant formula from Chinese cows' milk

国产奶粉（国产奶源）

2.Domestic produced infant formula using imported milk powder

国产奶粉（进口奶源）

3.Imported infant formula – foreign companies

进口奶粉（外国企业）

4.Imported infant formula manufactures abroad by Chinese companies

进口奶粉（中国企业境外办厂）

5. Chinese company/brand selling infant formula produced by contract manufactures that are outside China
中国奶粉公司/品牌（售卖境外合同公司制造的奶粉）

Quality of milk is influenced by the diet of the cow
牛奶质量取决于牛的饮食质量



Study 8: Survey on consumer knowledge and preferences for different types of infant formula products

研究8：调查消费者对四种奶粉产品的了解程度及偏好

1.Domestic produced infant formula from Chinese cows' milk

国产奶粉（国产奶源）

2.Domestic produced infant formula using imported milk powder

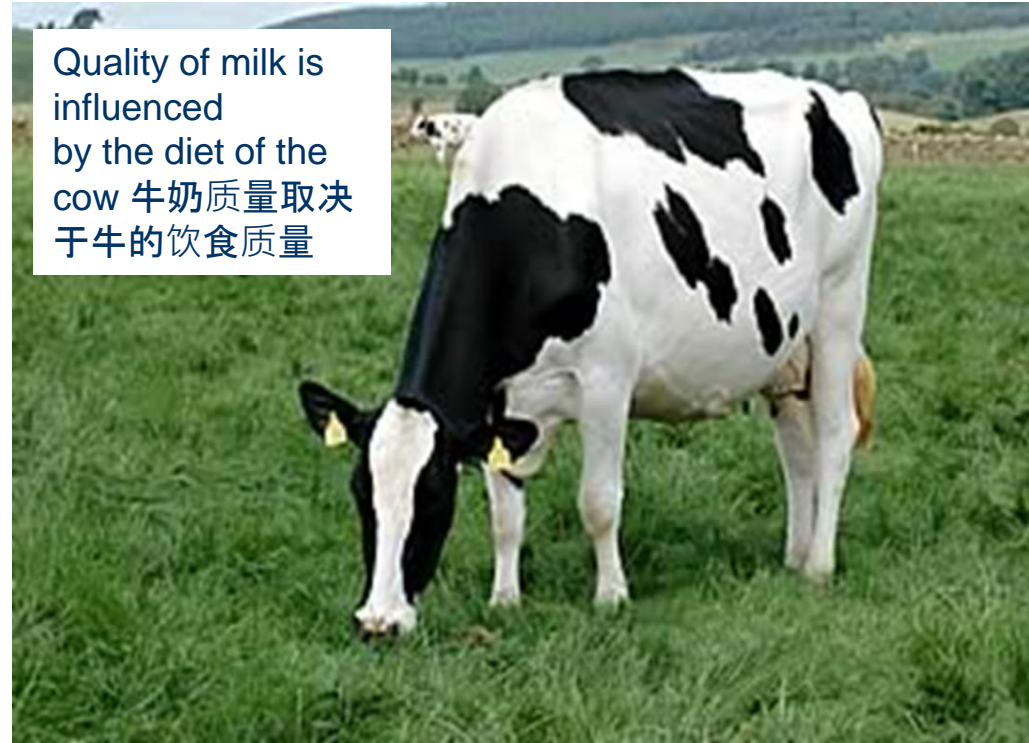
国产奶粉（进口奶源）

3.Imported infant formula – foreign companies

进口奶粉（外国企业）

4.Imported infant formula manufactures abroad by Chinese companies

进口奶粉（中国企业境外办厂）



**Consumers are seeking evidence that
the infant formula is as describe on the tin**

**One way to educate them if via QR codes linked
to virtual tours of the farms and factories**



**Alibaba is a major global player in e commerce
China has the technology to be a world leader in
consumer engagement in the area of food safety**



Conclusions 结论

To take the 'risk' out of 'food risk communication': the communication should

- Be based on good understandings of consumer issues
- Take advantages of digital tools, and new media channels that are embraced by consumers

为了降低食品信息交流 效果不佳的风险, 交流策略应该

- **基于对消费者的充分了解**
- **考虑利用数字媒体技术, 和消费者最常使用的新媒体渠道**





www.euchinasafe.eu



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