

Government Chemist Conference 2012 – Safe Authentic Food, Policy and Enforcement Challenges and Opportunities

Derek Craston, Government Chemist, LGC, Queens Road, Teddington, Middlesex, TW11 0LY, UK

Introduction

The Function of the Government Chemist was defined more than a century ago as a safeguard to industry, Government and the legal system for the fair and practical implementation of food and agricultural laws. In the intervening years Government and my predecessors have maintained the Function and the underpinning skills necessary to deliver this, to match the issues of the day. Continuous evaluation and evolution are critical to ensure relevance and interaction with our stakeholders is essential in that process. Hence we hold annual conferences at which our work and findings are discussed. These alternate between statutory food and agriculture work for example the 2012 conference from which these papers stem and our advisory work with wider industry with a forthcoming event in February 2013.

Realising that time is increasingly precious and that multidisciplinary working is now the norm we have sought to maximise opportunities to share knowledge. To that end our conferences have evolved into cooperative events involving the Food Standards Agency, Defra, the Association of Public Analysts Educational Trust and the agrifood sector research bodies Campden BRI and Leatherhead Food Research. To each I extend my thanks for adding to the diversity and interest of the presentations and the quality of debate.

I am also grateful for the support I receive from the National Measurement Office, in particular Graham Reid and Robert Gunn and the Government Chemist Working Group chaired by Paul Berryman which provides governance and excellent feedback and advice on our work.

A particular word of thanks goes to the presenters at the conference especially those who have taken the extra trouble to turn their slides into text for this special item in the Journal of the Association of Public Analysts.

Margaret Gilmore, Board member of FSA, gives an overview of the Agencies remit and how it interacts with enforcement and the food industry in managing incidents. Margaret highlights that FSA is evidence-based with policies and consumer advice developed according to the best available science. In fact in spending 20 per cent of its budget, some £25m, on research the FSA is the main spender on food safety research in this country.

Helen Grundy of the Food and Environment Research Agency (FERA) provides a clear overview of food authenticity and food fraud research. Her paper gives a very readable account of cutting edge science tackling food authenticity issues. She describes a range of sophisticated tools and continuing research including mass spectrometry, NMR, stable isotope and elemental analysis, metabolomics and proteomics.

LGC has a long history of involvement in nutritional analysis so it is also particularly pleasant to see the paper by Mark Roe and Paul Finglas of the Institute of Food Research on IFR's Food Databanks. This 4-year project (2009-2013), funded by the Department of Health, to review, update and maintain UK data on the composition of foods, will culminate in the publication of the 7th edition of McCance and Widdowson's "The Composition of Food". The project is supported by the British Nutrition Foundation, LGC Ltd, Eurofins Laboratories Ltd and The Royal Society of Chemistry.

An international dimension is brought by Kerstin Gross-Helmert in her paper on the European Food Safety Authority: Fostering Scientific Cooperation in Europe. Kerstin's theme that scientific cooperation within Europe and beyond is crucial to help ensure that the food we eat is safe is one we all wholeheartedly subscribe to.

Yuk Cheung kindly provides a paper from our 2010 conference on her own views on laboratory services operating in an increasingly competitive market. Buying an analytical service is unlike buying everyday consumer products and Yuk challenges a supply model based on market forces alone. With ever-increasing pressure on local and national authorities to reduce costs in all public sectors this will undoubtedly present new and interesting challenges. Growth, productivity and quality will continue to exert their influence and provide the key measures of success in 21st century management.

From within LGC Milena Quaglia describes the application of protein mass spectrometry to the analysis of allergens. Milena discusses exact matching isotope dilution mass spectrometry, IDMS, successfully applied to a model system of lysozyme in wine. This is a major step forward towards the production of biological reference materials in the food area to improve robustness, confidence and comparability of the results obtained by immunoassay and other techniques for allergens.

I end this introduction by acknowledging with gratitude the input of the editor of the Journal, Norman Michie and the Council of the Association of Public Analysts. Their success in maintaining JAPA online as an open access scientific journal focused on the work of Public Analysts says much about the skills and dedication of the profession and I am sincerely grateful for this opportunity to contribute to the proceedings.