August 2017 – School of Food and Nutritional Sciences contribution to SEFS section of President's Report to Governing Body, Sept 2017

Background: Guidelines for contributions to "President's Report to Governing Body" (UMTO 27-02-17)

Information provided should be condensed and only include key points;

•information should relate to a strategic objective being pursued by the area and a report on progress to date should be provided;

•information may also be provided on College / Functional area initiatives and how the initiative has added value

•concise backup material can be provided in appendices;

•information should also be provided on major external recognition e.g. acknowledgements, major awards, prizes, publications etc.

(Note: I have used headings taken from the SEFS strategic plan 2013-17 principle actions: https://www.ucc.ie/en/media/support/hr/briona/CollegeofSEFSStrategicPlan2013-17.pdf, pages 3-7)

School of Food and Nutritional Sciences Items for Consideration

3.6. Outreach

Eating Well with Swallowing Difficulties in Cancer cookbook

Difficulties chewing and swallowing food affect cancer patients suffering from cancer of the mouth. A team of oncologists, dieticians and chefs based in UCC and CIT has developed a cookbook with 60 recipes, *Eating Well with Swallowing Difficulties in Cancer*. Dr Aoife Ryan, Dietitian and Lecturer in Nutritional Sciences in the School of Food and Nutritional Sciences, UCC, is a lead author of this book.

Cork Summer Show 2017

The School of Food and Nutritional Sciences was pleased to have a stand at the Cork Summer Show in June 2017. Notable visitors included Micheál Martin, TD, Leader of the Opposition.

3.8. Research and Innovation

3D printing of cheese

In a paper published in February 2017 in *Journal of Food Engineering*, researchers at the School of Food and Nutritional Sciences at UCC demonstrated for the first time that cheese dairy products can be good materials for customized 3D printing. Profs Alan Kelly and Joe Kerry, in collaboration with Dr Alan Morrison of the School of Engineering, supervised the work of visiting French undergraduate student, Camille Le Tohic. The team are now working on more systematic model systems which are much less complex than cheese, for example using mixtures of milk proteins at present to build a product, such as a high-protein snack, from the basics up, and designing recipes which might work

best for 3D printer. The UCC work has drawn media and social media attention from around the world, showing the public interest in the technology, and has been covered on CNN.com, LiveScience.com and the Daily Mail (UK).

Outstanding Technical and Professional Achievement award for Professor Yrjö H. Roos

The American Society of Agricultural and Biological Engineers (ASABE) recently honoured Professor Yrjö Roos, School of Food and Nutritional Sciences, with an award for outstanding technical and professional achievement for his use of glass transitions and state diagrams in food engineering as fundamental tools for processing and stability control.

3.9. Business and Industry

Health Claims Toolkit

A UCC team has produced a comprehensive toolkit to support the needs of small- and medium-sized enterprises (SMEs) in the food sector who are considering making health claims for their products.

Dr Alice Lucey, Clara Heneghan and Prof Mairead Kiely have completed this toolkit as part of the EU-FP7 BACCHUS integrated project. This tool-kit is available for free download at the BACCHUS project website at <u>http://www.bacchus-fp7.eu/</u>

Achieving consistency with thermal technologies

In April 2017, UCC's Food Industry Training Unit collaborated with Dr Mike Lewis to provide a second advanced course on thermal technologies for the food industry.

Over 30 industry operations, research and development personnel attended the lectures, practical and analytical sessions in the School of Food & Nutritional Sciences, UCC.

Thermal processing workshop

On 23rd June, 2017, the Food Ingredients Research Group at UCC hosted a large industrial workshop on the topic of *Understanding, Predicting and Monitoring Heat Stability*.

The workshop formed part of a core project based on heat stability of dairy protein systems, a Dairy Processing Technology Centre (DPTC) project. It was attended by over 20 delegates from Tipperary Co-op, Arrabawn Co-op, Lakeland Dairies, Carbery, Kerry, Glanbia and Dairygold Food Ingredients.

Ice Cream Science & Technology: An International Training Workshop

In February 2018 the Food Industry Training Unit (FITU) will host an intensive three-day course with Prof Douglas Goff (University of Guelph, Canada) providing participants with knowledge of the science and technology of ice cream and frozen desserts, including ingredients, processing and quality aspects.

International Congress of Meat Science and Technology (ICoMST) ICoMST 2017

The International Congress of Meat Science and Technology (ICoMST) is an annual gathering of meat scientists from around the world, with over 150 different organisations represented from over 65 countries. This year the congress was held in Cork, from 13th to 18th August 2017.

Sessions covered topics from sustainability, production and welfare to meat safety, processing and the effect on health. Professor Joe Kerry, School of Food and Nutritional Science, co-chaired the Congress. Delegates experienced a "Taste of Cork Evening," a food market held in UCC campus, as part of the social programme.

--

Report materials compiled by Dave Waldron and edited for presentation in this format by Bronagh Clarke, School of Food and Nutritional Sciences, UCC.