

FEBRUARY 2020 NEWSLETTER

NETWORK NEWS

Welcome to our February newsletter. First, great news! From this issue onwards, we will be including more short features on our members' work in relation to food security. This is to keep you informed on the work our members* are currently doing, to promote our members' visibility within the network and in the University, and generally, to increase their profile within academia and society. For this issue, we profile doctoral student Warren Arinaitwe's recent work in Uganda.

For the same reasons, we will also be increasing the frequency with which we publish researcher interviews on our website. To celebrate International Women's Day on 8th March, we will be profiling some of our female researchers throughout March on our website. Please keep an eye out for those interviews from next week onwards. The previously promised interviews with two of our Travel Fund recipients, [Nick Fradgley](#) and [Dorien Braam](#), will thus be published online in April. Please keep an eye out for those as well.

Members (both researchers and professional staff) are welcome to contact us if they would like to have a short feature on their current work in the newsletter, and have not been featured in the newsletter within the last six months. While all are welcome, we will give preference to those at the early and mid-career stages. We also remind our members that they are welcome to submit their recently published scientific articles for promotion, as well as any reviews, opinion pieces, or newspaper articles they would like us to consider for publication. Lastly, from now on, we will be publishing this newsletter every two months, with our next issue to be published in April. We have taken this decision so that we have more time to create the best quality content for you, our valued reader.

* Please note that IRC membership is limited to staff and students of the University of Cambridge.

Finger millet is Uganda's second most important cereal after maize, and is both a staple and cash crop. Farmers prefer to grow finger millet because of its tolerance to drought, pests and diseases, its long storage life, and its health benefits. While these benefits have made finger millet a significant crop in combating hunger and malnutrition in Uganda, farmers still use traditional methods to cultivate finger millet, leading to low yields, poor quality grains, and postharvest losses. Additionally, farmers have limited contact with agricultural extension services. In order to bridge the vacuum in extension services in Uganda, [Warren Arinaitwe](#) has been organising and facilitating on-farm outreaches there since 2014. Last December, he mobilised and trained over 100 Ugandan finger millet farmers on sustainable agricultural practices. Warren trained the farmers on practical ways to identify and manage both abiotic and biotic finger millet stressors such as pests and diseases, weeds, nutritional deficiencies, and weather-related damages. The group, most of whom were older female farmers, or younger male and female farmers, also received advisory services from Warren on variety selection, quality seed production, postharvest handling, cooperative marketing, and data management.

FEBRUARY 2020 NEWSLETTER



Warren Arinaitwe (second from left) interacting with farmers in a finger millet field during one of his field visits in South Western Uganda.

LISTINGS UNIVERSITY OF CAMBRIDGE EVENTS

14 March. [Sustainable approaches to increase future food production via plant genome engineering.](#) **Cambridge, UK.** Cambridge Science Festival event.

14 March. [Algae: food for the future.](#) **Cambridge, UK.** Cambridge Science Festival event.

14 March. [How to feed the world: understanding plants and their environment.](#) **Cambridge, UK.** Cambridge Science Festival event.

15 March. [Do you trust your food? EIT Food wants to know.](#) **Cambridge, UK.** Cambridge Science Festival event.

19 March. [LATE: Perceptions of Vision and Taste.](#) Join our panel discussion about the sustainability and responsible production of one of our best-loved foods – chocolate. 'Can you live without chocolate?' From 6.30pm - 7.30pm. **Cambridge, UK.**

20-22 March. [Innovation in Food Security Venture Creation Weekend.](#) **Cambridge, UK.** Funding is

FEBRUARY 2020 NEWSLETTER

available for University of Cambridge final year PhD students or postdoctoral researchers. Please find the funding application form [here](#).

EXTERNAL EVENTS

3 March. [Gender Equality: The Future of the Food & Farming Industry.](#) London, UK.

5 March. [#Made in Cambridge.](#) The story behind Superwheat, as told by Professor Alison Bentley. Cambridge, UK.

9-10 March. [AI For Wheat Workshop.](#) London, UK.

12 March. [Young Innovators' Forum Conference. Innovation to balance conservation and farming.](#) Wymondham, UK.

19 March. [Global agricultural production and trade drives infectious disease threats in developing nations.](#) London, UK.

23 March. [The Veg Summit and Peas Please Prizes 2020.](#) Oxford, UK.

25 March. [Westminster Food and Nutrition Forum.](#) The UK food supply chain - fairness, UK climate change commitments, and the future for regulation and trading relationships. London, UK.

31 March. [Young Innovators' Forum Visit: Essex Plant Innovation Centre.](#) University of Essex, UK.

24 April. [BME Early Career Researcher Conference 2020.](#) London, UK.

25 April. [Earth Optimism 2020.](#) Cambridge, UK.

13 May. [TAA Seminar. From the ground up: soil management in a changing climate.](#) Cambridge, UK.

14 May. [From Farmer to Pharma—and Beyond.](#) Harpenden, UK.

4 June. [GROW: Agri-Tech Business Plan Competition.](#) Cambridge, UK. Registration deadline: 28 February.

University of Cambridge staff and students should contact Dr Mariana Fazenda at ml745@cam.ac.uk for more information about Agri-TechE member discounts.

10-11 June. [EAT Stockholm Food Forum 2020.](#) Registration by invitation, but interested parties can apply for a place.

13-16 October. [12th International Conference on Life Cycle Assessment of Food: Towards Sustainable Agri-Food Systems.](#) Germany. Registration deadline: 13 October.

FEBRUARY 2020 NEWSLETTER

PUBLICATIONS AND MEDIA

***Contact us** if you are an IRC member and would like support in promoting your new publication.*

[Vomiting bumblebees show that sweeter is not necessarily better.](#) IRC member Jacqueline Garget's article on a new study shows that the sweetest nectar is not necessarily the best nectar for bumblebees, as it slows their ability to drink and then regurgitate nectar. This informs their nectar preference, and which plants they consequently visit and pollinate. The results of this study will be used to inform plant breeding programs to make plants more attractive to pollinators, and thus boost their yield to feed the world's growing population.

[How ultra-processed food took over your shopping basket.](#) Is ultra-processed food making us ill and driving obesity rates? By Bee Wilson.

[FAO 2019 Africa Regional Overview of Food Security and Nutrition.](#) Containing the damage of economic slowdowns and downturns to food security in Africa. FAO.

[Against the grain: why millet is making a comeback in rural India.](#) Indian farmers are recultivating millet as a less water intensive alternative to rice. By Anne Pinto-Rodrigues.

Journal Papers

[A Roadmap for Lowering Crop Nitrogen Requirement.](#) *Trends in Plant Science*. October 2019. Involving IRC members **Stéphanie M. Swarbreck** and **Howard Griffiths**.

[Managing Oil Palm Plantations More Sustainably: Large-Scale Experiments Within the Biodiversity and Ecosystem Function in Tropical Agriculture \(BEFTA\) Programme.](#) *Front. For. Glob. Change*. January 2020. Involving IRC members **Amelia Hood**, **Sarah Luke** and **Michael Pashkevich**.

[The mechanics of nectar offloading in the bumblebee *Bombus terrestris* and implications for optimal concentrations during nectar foraging.](#) *J. R. Soc. Interface*. January 2020. Involving IRC members **Hamish A. Symington** and **Beverley J. Glover**.

[Impact of the announcement and implementation of the UK Soft Drinks Industry Levy on sugar content, price, product size and number of available soft drinks in the UK, 2015-19: A controlled interrupted time series analysis.](#) *PLOS Medicine*. February 2020. Involving IRC members **Tarra Penney** and **Jean Adams**.

[Fluorescent reporters for functional analysis in rice leaves.](#) *Plant Direct*. February 2020. Involving IRC member **Julia M. Hibberd**.

FEBRUARY 2020 NEWSLETTER

FUNDING OPPORTUNITIES

If you are a University of Cambridge researcher interested in putting together an interdisciplinary application and would like assistance in finding suitable collaborators/coordinating a group meeting, please [contact us](#).

[Agri-food funding round-up](#). A compilation of the latest funding calls relevant to the agriculture, food, and drink manufacturing sectors.

[Citizen Food Waste Behaviour Change Grant](#). WRAP wants to identify new behaviour change interventions that can be tailored to food waste prevention. **Application deadline: 25 March.**

[Value from food waste small scale grant](#). WRAP wants to support new projects that can demonstrate the commercial possibility of biochemical processing options for high-volume challenging or hard-to-tackle streams of wasted food. **Application deadline: 26 March.**

[ISCF smart sustainable plastic packaging: feasibility studies and industrial research](#). UK businesses and RTOs can apply for a share of up to £1 million from the Industrial Strategy Challenge Fund for early-stage projects in smart and sustainable plastic packaging. **Application deadline: 1 April.**

[“Development of targeted nutrition for prevention of undernutrition for older adults \(PREVNUT\)”](#). This call supports transnational and transdisciplinary research projects that will improve the prevention of undernutrition in older adults. **Application deadline: 7 April.**

[Innovative business ideas for new products: apply for funding](#). Businesses can apply for £25 million of Smart funding to develop game-changing products and services in any area of technology, science and engineering. **Application deadline: 22 April.**

[Strategic Priorities Fund: Centre for Doctoral Training \(CDT\) in Food Systems](#). UK Research and Innovation (UKRI) in partnership with the government announce a £5 million call to support one Centre for Doctoral Training focused on developing the next generation of interdisciplinary food systems thinkers. **Application deadline: 13 May.**

[UK-Canada: enhancing agricultural productivity and sustainability](#). UK-Canada business partners can apply for a share of up to £2 million, from the Industrial Strategy Challenge Fund, for innovative projects that enhance the productivity and sustainability of crop, livestock and aquaculture systems. **Application deadline: 20 May.**

OTHER OPPORTUNITIES

Numerous PhD [calls](#) across the Agri-Food system. **Deadline: 6 March.**