Sensors in Food and Agriculture 2018

18 – 19 July 2018

John Innes Centre
Norwich Research Park

Welcome

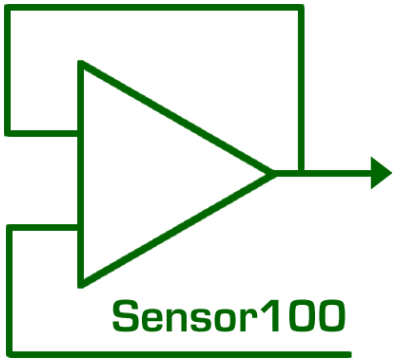
Sensor technology is playing an increasingly important role in the production of food, literally from farm to fork.

Monitoring crop production in the field, animal welfare, food manufacture and consumer protection are all areas where sensor technology makes a significant contribution.

Sensor100 annually brings together innovators in the application of sensors to agriculture and food production. This short set of slides provides an introduction to **Sensors in Food and Agriculture 2018**. **Register** now to learn new things, meet new people, discover new technology, all in the informal environment which characterises Sensor100 conferences.

Michael Brand
Conference Chair

Organised by:



Sensor100 is an international network of people and organisations active in the development and commercialisation of sensor technology applied to life sciences

Venue

The John Innes Centre is an independent, international centre of excellence in plant science, genetics and microbiology

It is among the UK's leading agricultural research centres

John Innes Centre

Conference Centre

Norwich Research Park
Colney Lane
Norwich
Norfolk NR4 7UH

Directions

www.jic.ac.uk

Program

Wednesday 18th July	
09:00	Keynote address: Prof. Julie McCann
10:00	Sensors in crop production
13:00	Lunch
14:00	Sensors in crop production Contd.
18:00	Presentations end
18:00	Networking reception
20:00	Reception ends

Thursday 19th July	
09:00	Keynote address: Dr. Eithne Dempsey
10:00	Sensors in food production
13:00	Lunch
14:00	Sensors in animal welfare
16:00	Concluding remarks; next steps; poster awards
17:00	Conference ends

Full Program

Keynote address: 18th July

“So you want to use IoT in Agri?”

Research interests
Decentralised Algorithms, Protocols, Cross-Layered Solutions to Wireless Sensor Networks, Ubiquitous and Mobile computing and Autonomic Computing.

Prof. Julie McCann
Department of Computing
Imperial College London

Sensors in Crop Production

Automated detection of plant pathogens in the field - the future of precision agriculture
***Dr. Kevin King**, Rothamsted Research*

3D Multispectral imaging systems for near range plant and fruit trait assessment
***William Averdieck**, Fotenix Limited*

High definition soil sensor system HD-S3
***Prof. Peter Wilson**, University of Bath*

Non-intrusive insect monitoring using LIDAR, from counting to classification
***Klas Rydhmer**, FaunaPhotonics ApS*

Ag Tech 2.0: Artificial Intelligence and Beyond
***Ed Plowman**, Hummingbird Technologies*

Crop Production …..

Targeted Detection of *Zymoseptoria tritici* in *Triticum*
***Chris Adams**, Imperial College Silwood Park*

Sensors for reporting soil nitrogen availability
***Prof. Tony Miller**, John Innes Centre*

Multispectral Imaging in agriculture
***Isobel Ashbey,** Cambridge Consultants*

Heterogeneous agricultural autonomous robotic platform:HAARP
***Dr. Pejman Iravani**, University of Bath*

Development of an automated smart trap for wheat pathogen detection
***Dr. Daniel McCluskey**, University of Hertfordshire*

Applications of IoT in agriculture in developing countries
***Dr. Foysol Chowdhury**, BRAC University, Bangladesh*

Keynote address: 19th July

“Biosensing devices for animal fertility and disease monitoring”

Research interests
Micro and nanosensor technology including nano/microfabrication (applications in human and animal healthcare);

Design and fabrication of integrated fluidics/sensor microsystems which exploit the unique properties of electrocatalytic/nanomaterials for biomedical diagnostics.

Dr. Eithne Dempsey
Department of Chemistry
Maynooth University
Ireland

Sensors in Food Production

The development of a Chilli Hotness Meter - Scoville Meter
***Dr. Martin Peacock**, Zimmer and Peacock*

Rancidity of coconut cream
***Charles Veys**, Arosa*

Monitoring spoilage of meats with 'zero-cost' paper-based gas sensors
***Dr. Firat Güder**, Imperial College London*

Keynote address 19th July

“Utilising machine learning and IoT solutions to improve livestock health and welfare”

Research interests

The main goal of her research is to improve animal health and welfare on farms. To achieve this she combines understanding of disease biology, epidemiology, animal behaviour with use of innovative technologies (precision livestock technologies), data analytics and predictive modelling.

Dr. Jasmeet Kaler
University of Nottingham
School of Veterinary Medicine and Science

Sensors in Animal Welfare

Biosensors for real-time monitoring of biohazards and disease in aquaculture
***Dr. Ian Johnston**, University of Hertfordshire*

Sensor orientation for the indication of lameness in sheep
***Zainab Al-Rubaye**, University of Northampton*

Exhibits

Arosa Instruments Limited

BIODOT

HAMAMATSU
PHOTON IS OUR BUSINESS

IBST

KTN
the Knowledge Transfer Network

roboscientific

Sensor100

Zimmer & Peacock
eSensor Manufacturing and Technology

Exhibitors have a 10 minute speaking slot during the program.
Exhibitor spaces are available: contact info@sensor100.com

Posters

Posters are invited from post-graduate students and others

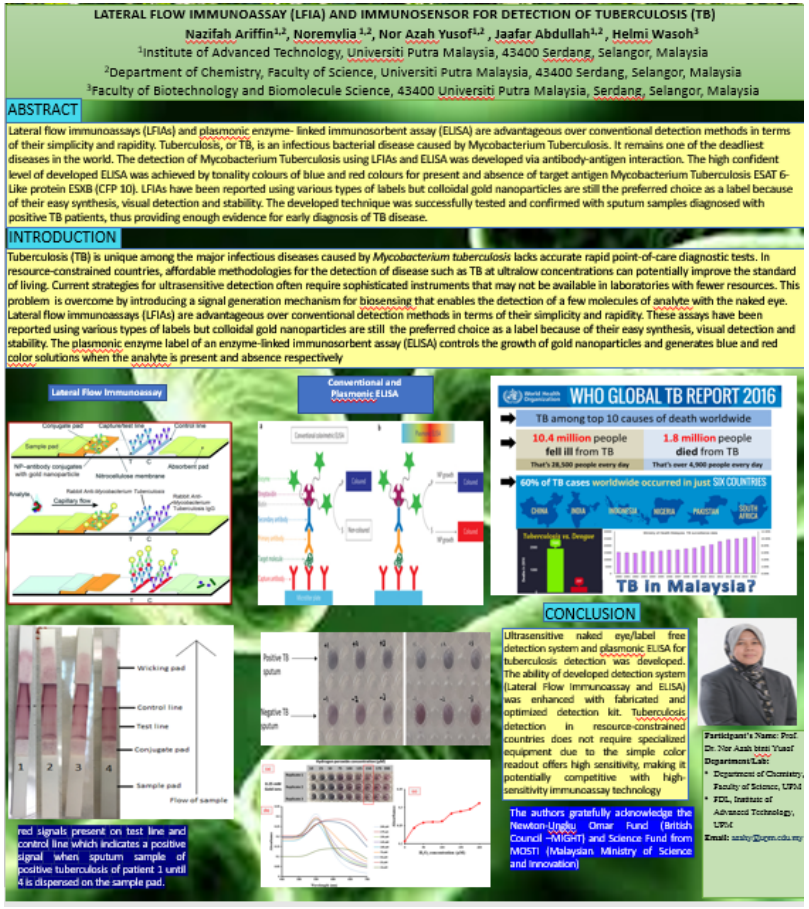
All posters will be entered into the poster competition, judged by the delegates. The top three posters will win trophy awards

Can't come to the conference?

Send us your poster as a pdf, we'll print it and enter it into the competition

Nominal fee for printing applies

Contact info@sensor100.com for more information.



Reception

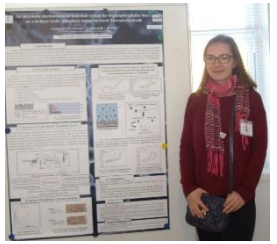
Sensor100 conferences always include a seasonal reception. Past receptions have included Sacred gin, an Italian theme, roast beef rolls, Sagitiba and Mexican tapas, and a Christmas party.

Join us at SFA2018 to see what the caterers in Norwich can concoct. It will be good!

Finger food, beer & wine and soft drinks guaranteed.

Meet the exhibitors

Judge the posters



Meet the speakers

Registration

Register for:

- Wednesday 18th July
- Thursday 19th July
- Both 18th & 19th July

Full Registration fees:

- Commercial £600
- Academic £500
- Student £150

20% VAT added to fees

Discounts

- 10% for group registration from same organisation
- 45% Single Day 18th July (includes Reception) – Discount Code **SFA18-1**
- 55% Single Day 19th July - Discount Code **SFA18-2**

Student rates apply to those in full time education leading to a higher degree. Documentary evidence my be required.

Register Now!

About Sensor100

Founded in 2011, Sensor100 is an international network of organisations and people active in the development and commercialisation of sensors for application in the life sciences

Currently with over 3000 members in over 70 countries, Sensor100 provides:

- a monthly eNewsletter
- conferences on the application of sensors in medicine, the environment, and food & agriculture

Join our mailing list to receive the eNewsletter:
www.sensor100.com/Newsletter.html

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