

EFITA/WCCA 2007 conference - Draft programme

Sunday 1st July

Start time

1300 Registration - William Harley/CPD reception area

1600 Registration closes

1800 Civic Reception in Glasgow City Chambers

Monday 2nd July

Start time

8:00 Registration - William Harley/CPD reception area

09:00 **Opening Ceremony A001 - Chair Caroline Parker**

Welcome to the University: Prof Pamela Gilles, Principle & Vice Chancellor, Glasgow Caledonian University

Introduction to the conference: Karel Charvat, EFITA Chairman

Keynote: Prof John Oldham, Head of Research and Development, Scottish Agricultural College

10:30 **Tea/coffee break**

11:00 **Environment theme Plenary A001 - Chair Andy Offer**

Keynote: Dr Emma Hennessey, Defra

Discussion session: What can realistically be delivered by science to policy makers

12:30 **Lunch & exhibition**

	Room 2	Room 5	Room 6/7	Room 8
14:00	<p>Environment theme Chair: Andy Offer <i>Climate</i></p> <p>Climate Change and Cereal Crops Growing In Hungary. É. Erdélyi, An. Ferenczy & D. Boksai</p> <p>Model-based climate change impact assessment for agriculture in a moraine landscape of North-East Germany and adaptation possibilities. W. Mirschel, F. Eulenstein, M. Willms, R. Wieland, U. Schindler & K.-O. Wenkel</p> <p>Change of Climatic Needs of Agricultural Plants, According to Measured, and Climate Models Data. S. Bella, G. Szépszó & S. Szalai</p> <p>The Increase Of Risk In Hungarian Vine Production Due To Climate Change. M. Ladanyi, É. Erdélyi & K. Szenteleki</p>	<p>Environment theme Chair: Ian Houseman <i>Pesticide management</i></p> <p>A GIS-based study on regional pesticide deposition due to airborne drift. H. Holterman & J. van de Zande</p> <p>A new versatile tool to compute spray drift hazards for downwind off-target areas. H. Holterman and J. van de Zande</p> <p>Development of an Improved Pesticide Properties Database for Risk Assessment Applications. K. A. Lewis, A. Green & J. Tzilivakis</p> <p>CRITER, a tool to conceive and evaluate innovating cropping systems Y. Sohbi, R. Reau & L. Guichard</p> <p>A Risk Management System for Agrochemical Use Design, Development and Applications. T. Nanseki, H. Kimura, & M. Sato</p>	<p>Business theme Chair: L Theuvsen <i>DSS - Applications</i></p> <p>How Galileo improves farming: innovation in on-farm and regional applications. R. Lokers, T. van der Wal and T. Turecki</p> <p>INFOPISC: The use of an information system as a support tool in control and decision making in small and medium fish farming in Pantanal region, at mid-west of Brazil. J. Pistori, A. R. Hirakawa, J. F. Vianna, R. B. Herebiad, & S. M. Amâncio</p> <p>PEGASUS: A Windows Program for Formulating and Evaluating Rations for Horses. A. Ahmadi & P.H. Robinson</p> <p>Developing managerial decision preparing system for food industry enterprises using heat treating autoclave Z. Fabulya & M. Nagy</p>	<p>Business theme Chair: C. Zanasi <i>Integrating databases</i></p> <p>A generalized framework for the implementation of integrated databases for animal recording schemes. E. Groeneveld</p> <p>Rapid implementation of integrated databases and inclusion of historic data in modern animal agriculture - an Open Source Solution. Z. Duchev, E. Groeneveld, & R. Fischer</p> <p>Comparing Concepts and Systems for the Integration of Information Systems in the Agrifood Sectors V. Jahn, T. Hannus, O. Poignée & G. Schiefer</p> <p>Integration and standardization in arable farming practice "The Koda program" J. Wolfert, C.N. Verdouw, & A.J.M. Beulens</p> <p>agroXML - a standardized language for data exchange in agriculture. M. Kunisch, J. Frisch, D. Martini & S. Böttinger</p>
15:30	Tea/coffee break			

16:00	<i>GIS/spatial systems</i> Chair: Andy Offer	<i>DSS/models</i> Chair: Ian Houseman	<i>DSS - Applications</i> Chair: M. Fritz	<i>Using databases</i> Chair: Y. Fernandez-Ordonez
	LandSFACTS software: Spatio-temporal allocation of crops to fields. M. S. Castellazzi, J. Matthews, G. A. Wood, P. J. Burgess, K. F. Conrad, & J. N. Perry	Integrating Strategies for Biodiversity Management into Agri-environmental Payment Schemes: A Decision Support Approach. A. Green. R. Winspear & K. Lewis	Profit Projection: A Windows Program to Project Profit or Loss for Beef Cattle Feedlot Operation J. W. Oltjen & A. Ahmadi	The Application of Databases as an Information Management Tool in Quality Certification Systems H. Schulze, F. Albersmeier & A. Spiller
	Dynamic geovisualizing of landscape changes and threatening processes using digital landscape model. H. Svatonova, J. Kolejka & K. Charvát	Decision Support Tools For A Sustainable Agriculture. M. Radulescu & C. Zoie Radulescu	SICAEM, a Tool for Decision-making in Aquaculture and Natural Resources Management. J. Soria-Ruiz and Y. Fernandez-Ordonez	FABISnet - A WEB Based Network of Farm Animal Biodiversity Information Systems. E. Groeneveld, Z.I. Duchev, M. Imialek, L. Soltys, M. Wieczorek, B. Scherf, O. Distl, G. Gandini, M. Jaszczynska, & A. Rosati
	GIS and Remote Sensing in Diachronic Study of Agriculture in Greece. M. Androulidaki, M. Salampasis, V. Samathrakakis & C. Ratzins	Greenhouse Modeling Using Neural Networks. M. Alberto Bussab, J. Israel Bernardo, & A. Riyuiti Hirakawa	Information and Communication Technologies for irrigation management. D. Boffety, J.-P. Chanet, G. André & F. Vigier	Evolution of Agro-food Current Research Information Systems in Italy. C. Sala
	Spatial analogues in climate change research. L. Horváth, M. Gaál, & N. Solymosi	An Expert System and Decision Support Tool to Interpret Phytomonitoring Information in Fruit Bearing Woody Plants. L. Gurovich & R. Alvarez	Information system for analyzing, designing and managing drying and storage of cereal grains. J. Weres, S. Kujawa, & T. Kluza	Definition of the ecological facilities, ecological indicators and quality of products in the Hungarian vine and wine sector using updated GIS databases. K. Szenteleki, E.P. Botos, A. Szabo, C. Horvath, L. Martinovich & Z. Katona.
		SIMGreen: A Simulation Tool for the Greenhouse Climate. J. Boaventura Cunha	Building a Technical Support Service for Irrigation Management. J. Maia, M. Castro Neto & I. Oliveira	Repository of Field Crops data to Support DSS for crop rotation. A. Hetzroni

17:30 **Sessions end**

18:30 **Caledonian Reception and Whisky tasting - Refectory extension**

Tuesday 3rd July

Start time γ

8:00 Registration - William Harley/CPD reception area

09:00 Business theme Plenary A001 - Chair - Gerhard Schiefer

Keynote: Dr. Kristian Moeller, Secretary EUREPGAP, Managing Director FoodPLUS

09:50 Tracking, Tracing and Online Quality Management Support for Risk Control and Market Access. G. Schiefer

10:10 Certification Schemes, Quality-Related Communication in Food Supply Chains and Consequences for IT Infrastructures L.Theuvsen & C.-H. Plumeyer

10:30 **Tea/coffee break**

	Room 2	Room 5	Room 6/7	Room 8
11:00	Environment theme Chair: Andy Offer <i>Enviroment</i>	Business theme Chair: J. Spilke <i>DSS development</i>	Business theme Chair: F. Zazueta <i>e-marketing</i>	Business theme Chair: M. Neto <i>Traceability</i>
	UML Constructs to Support the Development of Land Cover/Land Use Information Systems. Y. Fernandez-Ruiz & Jesus Soria-Ruiz Assessment of the Environmental Sustainability of a Traditional Brazilian Coffee Farm. Y. Ogura, B.F. Giannetti, C.M. V. B. Almeida & S.H. Bonilla A comparative study between precision agriculture and biodiversity modeling systems. . F.S. Santana, E. Murakami & A.M. Saraiva Municipal environmental-monitoring system. F. Speiser, I. Magyar, R. Jamniczky & Á. Rédey Community information systems based on Unified Modelling Language to create a participatory monitoring tool on the environmental impact of agriculture. . M. S. Barzman & C. Cornu	A macroeconomic (simultaneous equation) model of the Estonian grain sector. R. Pauldaru, J. Roots , A-H. Viira, & R. Värnik A strategy for incorporating plant diseases coupled with leaf sensor measurements into CERES-Wheat. K. Gröll, S. Graeff & W. Claupen Metamodel approach to grain acceptance, storage and processing system design. S. Arhipovs Irriguide: a decision support tool for drainage and irrigation scheduling. M. Silgram, D. Hatley & R. Gooday An approach based in text-mining for knowledge acquisition phase in diagnostic systems. S. Massruha	ICT in agro-alimentary products promotion. P. Jure & A. Vacchieri Designing an Observatory of Agricultural e-Markets. N. Manouselis & C. Costopoulou The Agritourism And The Role Of Ecommerce In The Agribusiness Evolution: Evidence From A Regional Survey. S. Ammirato Marketing competency and market orientation for Internet-Marketing: empirical results and implications for the agribusiness. J. Voss	A Model and Prototype Implementation for Tracking and Tracing Agricultural Batch Products along the Processing Chain. L. Ruiz- An ontology based application framework for ICT-enabled traceability in the food supply chain. M. Salampasis & S. Ocak The interdisciplinary research project IT FoodTrace - introduction and selected preliminary results. R. Doluschitz, K. Brockhoff, T. Jungbluth, & C. Liepert Traceability System for Agricultural Products Distribution based on RFID Technology. K. Sugahara, K. Sato & Y. Konoc Trust for e-supplier relationship management in food networks: e-Trust. M. Fritz

12:30 **Lunch & exhibition**

14:00	<i>Controlling Diffuse Pollution</i> Chair: Andy Offer	<i>DSS development</i> Chair: C.Sala	<i>Internet based systems</i> Chair: K-O. Wenkel	<i>Quality and traceability</i> Chair: R. Dolschitz
	PLANET : a decision support system for routine nutrient management planning on farms. P. DAMPNEY	Development of an automatic irrigation system using a fuzzy controller. D. Yang, K. Nakano, T. Aida, K. Abe & Q. Chen	WEB Decision Support System for Biomass Plant Feasibility Study. R.Berruto & P. Busato	ETINET Web platform for traceability in the food chains: a large scale implementation for quality insurance and food safety control on an Italian region (SITRA project). G. Giannerini
	SPREADS: A System for Controlling the Costs and Efficiency of Manure and Slurry Spreading on Farms. . M. Gibbons, K. A. Smith & S. G. Anthony	Extensibility of Measurement Results of Point Samples of the Soil Protection Information and Monitoring System by different methods. L. Varallyai, B. Kovács, & J. Prokisch	Web based GIS as an information system for interdisciplinary research projects. C. Mückschel, C. Weist & W. Köhler	Electronic Collaboration Platforms for Communities. M. Pankiewicz, M. Fritz & G. Schiefer
	Cost-effective reduction of ammonia emissions from UK agriculture using the NARSES mass-flow model. K. Smith, S. Anthony, S. Humphries, T. Misselbrook & J. Webb	Colour Beef Image Segmentation Based on Kernel Fuzzy C-Means Clustering. CJ. Du & D.-W. Sun	Online management system for the delivery of farm advice by the UK Government. J. Wood	Cost-Benefit Analysis for Quality- and Traceability Systems in Supply Chains of Animal Products. M. Roth & R. Doluschitz
	Agricultural Landbank, Organic Waste, A National Capacity Estimator (ALLOWANCE). , B. Chambers, F. Nicholson, S. Anthony & C. Procte	An object -oriented framework for virtual diagnosis. S. Massruha, S. M. F. Silveira Massruhá, J. Pastorelli Dutra, S. A. Braga Cruz, S. Sandri, J. Wainer & M. A B Morandi.	ISIP: the German advisory portal for plant production. M. Roehrig	Quality systems of the agri-food industry - costs and benefits. S. Krieger & G. Schiefer
	INFITA meeting	Self parameterizing tools and subsystems in animal genetic evaluation. U. Müller , R. Fischer & E. Groeneveld	Mobil Internet in Agriculture especially in Hungary. R. Szilagyi	Possibilities and purposes of Internet usage: authenticity and fake of Italian food product. M. Platania & D. Privitera

15:30 **Coffee and poster session**

16:30 EFITA General meeting A001

17:30 **Sessions end**

18:30 **Conference Dinner at Stirling Castle** - coaches leave from University

Wednesday 4th July

8:30 Registration - William Harley/CPD reception area

09:30 Rural theme Plenary A001 - Chair - Sarah Skerratt
Keynote: Jeremy Millard, Danish Technology Institute

10:30 *Tea/coffee break*

	Room 2	Room 5	Room 6/7	Room 8
11:00	Rural theme Chair: S. Skerratt	Business theme Chair: S. Wolfert	Business theme Chair: J. Boaventura	Business theme Chair: I. Tysen
			<i>Traceability in use</i>	<i>Co-operative information systems</i>
	A Question and Answer Knowledge sharing system to support emergent farmers in Southern Africa. A. Buitendag & J van der Walt	Automatic Cleansing And Classification Of Cotton Images Using Cmyk Colour Splitting. S. A. Hayat , A. Abdullah , M. A. Chaudary, Y. J. Malik and W. Gillani	Identification of patterns in communication and interaction processes during food transactions. A. Ohliger, M. Fritz and G. Schiefer	Development of Prototype Computerized Cooperative Management and Member Information System. J. Juga, J. Puhakainen , P. Malinen and J. Nissiläb
	Rural empowerment through access to knowledge: a comparison of two projects on two continents. J. Swindel	PDA's for collecting crop data in the field. K. S. Shim, H. J. Lee, H. S. Ko, & J. H. Kim	FruitGame: a Simulation Tool to Evaluate Supply Chain Logistics and the Effects of Information Flows and Sharing for Fresh Produce. P. Busato, R. Berruto & P. Brandimartec	Functional evaluation of enterprise information systems in co-operatives. M. Herdon & T. Rózsa
	An evaluation of ICT and Internet use by Spanish agricultural Co-operatives. Contribution to minimiza digital divide. J.F. Juliá, G. García-Martínez & E. Silvestre-Esteve	Using Internet to booster growth in the Nigeria's food and agricultural sector. S. Aigbe	Investments in Tracking and Tracing Systems: An Empirical Analysis of German Food Manufacturers. L. Theuvsen & T. Hollmann-Hespos	Sophisticated Use of Learning Objects- Demonstrated with the Development of an E-Learning System. R. Daenecke, P. Giebler, J. Spilke & P. Walthe
	ICTs Role in Promoting Social Re-engineering Process in Rural Areas : Analysis of Village Knowledge Centres in India. DP. Khankhoje	Accompanying farmers in the building of collective rules for agrobiodiversity management. G. Abrami , D. Bazile , M. Dionnet, S. Dembele, C. Le Page & H. Coulibaly	IT solutions requested by Food Supply Chain Management. R. Doluschitz	Pest management: collective decision making from Pest management: collective decision making from knowledge building. J. Sio, L. Lorenzo & J. Almacellas
	Discussion of Implications for (1) Research & (2) Policy		The concept of supply chain management: Adoption in food networks. M. Fritz, E. Schneemann & G. Schiefer	

12:30 **Lunch & exhibition**

12:30 **SAC Farm visit** - coaches leave from university

18:30 **Boat trip** - boat departs

Thursday 5th July

8:00 Registration - William Harley/CPD reception area

	Room 2 Rural theme Chair: S. Skerratt	Room 5 Business theme Chair: C. Parker <i>ICT adoption- user view</i>	Room 6/7 Business theme Chair: I. Houseman <i>Education/training</i>	Room 8 Business theme Chair: N. Fog Hansen <i>GIS/precision farming</i>
09:00	<p>The rural areas in the Czech Republic and broadband access to internet. J. Vaněk, J. Jarolímek, P. Šimek, M. Pokorná.</p> <p>Towards regional coherence: increasing the participatory environments in rural communities for engaging with ICTs. S. Skerratt</p> <p>Can Videoconferencing Help Rural Sustainability? Z. Havlicek, E. Silerova & A. M. Westcott</p> <p>"ICT supporting rural sustainability The emergence of the rural e-community D. Heery & P. Fowler"</p> <p>Discussion of Implications for (1) Research & (2) Policy</p>	<p>Adoption of ICT in horticulture : Confronting scientists' opinions with practice in Flanders, Belgium. N. Taragola & D. Van Lierde</p> <p>What are the needs for agricultural software? An analysis of experiences and requirements of agricultural consultants. RM. Sodtke & M. Gottschick Information and Communication Technology (ICT) Adoption: Results of a Survey of the England and Wales Farming Community. M. M. Gibbons & A. L. Offer</p> <p>Development Of Information And Communication Technologies: A.-E. Lévêque , T.G. Kelly & Y. Michelin</p> <p>Adoption of Information and Communication Technologies by farming households in Haryana, India. I. Grover, V. Varma and N. Sethi</p>	<p>Educational metadata for agricultural learning repositories. A. Tzikopoulos, N. Manouselis, C. Yialouris & A. B. Sideridis</p> <p>Software development for the agri-food sector as the basis for a successful curriculum for agricultural engineering students. J. Weres, P. Boniecki & W. Mueller</p> <p>Training Rural SMEs on using e-Government services. N. Manouselis, A. Tzikopoulos, C. Costopoulou and A. B. Sideridis</p>	<p>eREPS - harnessing ICT to increase the efficiency and accuracy of farm surveying in Ireland. N. Cartera & M. Gibson</p> <p>Dynamic Data Integration of Agricultural Emergency Resources with Google Earth and Google Map. J. Xin & P. Hu</p> <p>Web-Based GIS Consulting Portal with Crop-Land Suitability. S.C. Jayasinghe & T. Machida</p> <p>Economic potential of site-specific management of wheat production with respect to grain quality. A. Meyer-Aurich, M. Gandorfer & P. Wagner Robot system for weed detection using textural image analysis. G. Polder, F. K. van Evert, A. Lamaker, A. de Jong, G. van der Heijden, L. A.P. Lotz, T. van der Zalm & C. Kempenaar</p>

10:30 **Tea/coffee break**

	Sensors and controls Chair: L. Gurovich	ICT adoption- improving Chair: K. Charvat	ICT adoption- improving Chair: M. Herdon	Information management Chair: R. Berruto
11:00	<p>Assessing the societal aspects of wireless sensor networks. R.M de Mol M. Mazzù, W. Savio, H. Wells, F. Glisenti, & K. Lokhorst</p> <p>Implementation of a Wireless Environment Controlling System. A. C. Alves Borim, C. A. Ramos Pinto, J. R Torrezin</p>	<p>The design and delivery of Decision Support Tools to maximise uptake. A. L Offer & M. M Gibbons</p> <p>Delivering science to the horticultural industry: learning from past mistakes. R. Reader, J. Murphy, K. Phelps & R. Collier</p>	<p>eREGIO - Evaluation method for ICT regional use. J. Jarolímek , J. Vaněk , P. Šimek & M. Pokornád</p> <p>Situation of French Agricultural ICT in 2007. G. Waksman, H. Escriou Hervé, R. Rognant & C. Gentilleau</p>	<p>Linking-up animal health connected information to an integrated animal health system. A. Tzikopoulos, N. Manouselis, C. Yialouris and A. B. Sideridis</p> <p>The Agricultural Document Library (ADLib) and its applications. J. Tziilivakis and K. A. Lewis</p>

Development of a smart transducer based on the IEEE 1451 standards applied to a beehive monitoring system. F. K. Tani & C. E. Cugnasca

User experience with GrainPlan: The Virtual Grain Store Manager. J. Shields

Improving usability and user acceptance of ICT systems in farming. P. Nurkka, L. Norros, & L. Pesonen

Bringing the Portuguese Agricultural Warning Services to a new Media. M. de Castro Neto, A. C. Pinheiro, M. Cavaco, and F. Mendes

Architecture and interoperability requirements for sensor-controlled irrigation. J. Casadesus, C. Biel, & J. Bonany

Facilitating knowledge transfer within the horticultural industry within the UK. C. Park

"Bringing the datawarehouse for agriculture into practice" in the eFarmer operation – Encouraging entrepreneurial competitiveness and regional development in rural areas. P. Šimek, J. Jarolímek & J. Vank

Investigating Ontology Development and Usage in Horticultural Production. M. Maliappis

Rhizopus Stolonifer Automatic Detection by Sensing the Tomato Peduncle Scar. F. Hahn

Information entropy and the uptake of DSS. N. McRoberts

Multi layer networked development. J. Geerligs & S. Wolfert

12:30 **Lunch & exhibition**

Chair: I. Houseman

ICT adoption- improving

Chair: C. Park

Internet based systems

Chair: G. Waksman

14:00 C@R project meeting

Role of Information Technology in the Dissemination of Agricultural Innovations in Australia. S. Arumapperuma,

Farmer Driven Web Developments. S. Harding

Internet use by horticultural growers in Flanders, Belgium: limits and future. D. Van Lierde

Web based Expert System for Diagnosis of Micro-Macro Nutrients Deficiencies in Crops. S.S.Patil, U.B.Angadi, B.V.Dhandra A.G.Shankar, M.Shivamurthy and

Factors affecting E-business adoption: Evidence from the Greek food industry. I. Vlachos, V. Zeimpekis, P. Chondros. M. Psarrou & N. Stragas

A Cypriot Organic Farmer's Way Towards Globalization. G. Adamides, N. Biberian & M. Giannakopoulou

15:00

15:30 Uptake of ICT Plenary A001 - Chair - Ehud Gelb

15:30 Keynote: Dr Anton Mangstl : Director, Library and Documentation Systems Division, FAO United Nations
Rapporteur feedback

16:15 Discussion

16:45 Closing ceremony

17:30

End of conference