

Program EMILI 2017**Sunday, May 21 2017**

14H00-17H30	Workshop "Measuring Emissions from Livestock: Which method for which purpose?"
16h00	Registration open

19h00 Cheese and Wine cocktail

Monday, May 22 2017

8h15-09h00 Arrival and registration of participants

Plenary session Maupertuis Amphitheatre Chairperson : J. Martinez (IRSTEA, France)		
09h00-09h30	Opening session	B. Fostier (IFIP, France), T. Eglin (ADEME, France), M. Hassouna (INRA, France)
09h30-10h00	Agriculture and Air Pollution in Europe : Current and Future Stakes	L. Rouil (INERIS, France)
10h00-10h30	New EU Environmental Standards for Large Pigs and Poultry Farms: Building Consensus between Stakeholders'	G. Giner Santonja (IPPC Bureau, Spain)
10h30-11h00	Challenges of Inventory Preparation: Activity Data, Emission Factors and Models	B. Amon (ATB, Germany)
11h00-11h30	Coffee Break	
11h30-12h00	Modeling of Gaseous Emission in Pig Production	J.Y. Dourmad (INRA, France)
12h00-12h30	Uncertainty Estimates for Livestock Facility Emissions Measurements	R. Gates (University of Illinois, USA)

12h30-14h00 Lunch

<p align="center">Parallel session (Lamennais Room 1) Mitigation strategies Chairpersons: F. Guiziou (IRSTEA, France) - N. Peiren (Flanders research institute for agriculture, fisheries and food, Belgium)</p>	
14h00-14h15	Effect of a Hop (<i>Humulus Lupulus L.</i>) Extract on the Methane Yield and Milk Production of Dairy Cows <i>Van Wesemael, D., Peiren, N., Vanderbeke, E., De Campeneere, S., Fievez, V., Vandaele, L.</i>
14h15-14h30	Estimating Intake, Daily Methane Emission, Production and Milk Quality from Lacting Cows Grazing on Pasture of Pennisetum Clandestinum and Silvopastorale System P. Clandestinum and Sambucus Peruvian <i>Mayorga, O.L., Sierra, A.M., Ariza, C.J. , Duran, E.N., <u>Benavidez, J.C.</u></i>
14h30-14h45	Inclusion of Olive Cake in Fattening Pig Feeds: Effects on Ammonia and Methane Emissions <i>Ferrer, P., Cerisuelo, A., García-Rebollar, P., De Blas, C., Estellés, F., Calvet, S.</i>
14h45-15h00	Analysis of Factors Affecting Ammonia and Methane Emissions from Pig Slurries : Slurry Composition and Dietary Factors <i>Antezana, W., Cerisuelo, A., Calvet, S., <u>Estellés, F.</u></i>
15h00-15h15	Soil Application of Acidified Slurry as Alternative to Raw Cattle-Slurry Injection to Minimise Gaseous Emissions in Mediteranean Conditions <i>Fanqueiro, D., Pereira, J.L.S., Surgy, S, Vasconcelos, E., Coutinho, J.</i>
15h15-15h30	Impact of Pig-Slurry Treatment and Application Techniques on Ammonia and Greenhouse Gas Emissions in a Mediterranean Forage System <i>Carneiro, J.P.B., Pereira, J.L.S., Surgy, S., Soares, D., Monteiro, J., Trindade, H., Coutinho, J., <u>Fanqueiro, D.</u></i>

<p align="center">Parallel session (Lamennais Room 2) Modelling Chairpersons: P. Robin (INRA, France) - I.B. Lee (Seoul National University, South Korea)</p>	
14h00-14h15	Statistical Identification of Key Factors for Dust Generation in a Pig House Based on Field Experiment <i>Ha, T., Lee, I.-B.</i>
14h15-14h30	A Compound Specific Evaluation of Odor Compounds: from Partition Coefficient to Pilot Scale Scrubber <i>Bruneel, J., Walgraeve, C., Demeyer, P., Van Langenhove, H.</i>
14h30-14h45	Development of Web-based Forecasting System of Livestock Airborne Virus using OpenFOAM <i>Ha, T., Lee, I.-B.</i>
14h45-15h00	Ammonia Emissions from Naturally Ventilated Dairy Cattle

	Buildings – a Review of Field Measurements in European Countries <i>Zhang, G.</i>
15h00-15h15	Analysis of the Maximum Potential of Ammonia Emission, from Laying Hens Manure, Through the Dynamics of Systems <i>França, L.G., Gates, R., Tinoco, I. F., Souza, C.</i>
15h15-15h30	A Flexible Semi-Empirical Model for Ammonia Emission from Field-Applied Manure <i>Hafner, S.D., Sommer, S.G., Pacholski, A.</i>

15h30-16h00

Coffee Break

Parallel session <i>(Lamennais Room 1)</i> Mitigation strategies Chairpersons: N. Guingand (IFIP, France) - P. Demeyer (Flanders research institute for agriculture, fisheries and food, Belgium)	
16h00-16h15	Development of an Exchange Scrubber: Cleaning of Exhaust Air and Heat Recovery in one Processing Stage <i>Krommweh, M. S., Büscher, W.</i>
16h15-16h30	Effect of a Ventilation Control System on the Ammonia Emission from Naturally Ventilated Dairy Barns <i>Ogink, N.W.M., Mosquera, J., Hol, J.M.G., Huis In 'T Veld, J., Van Dooren, H.J.C.</i>
16h30-16h45	Analysis of Liquid Nitrogen Components in Biological Air Scrubber Washing Water <i>Van Der Heyden, C., Volcke, E.I.P., Demeyer, P.</i>
16h45-17h00	Combined Exhaust Air Treatment at a Laying Hen Facility for Mitigation of Dust, Ammonia and Odour <i>Strohmaier, J.C.L., Kuennen, S., Diekmann, B., Büscher, W..</i>
17h00-17h15	Ammonia, Methane and Odour Abatement from Pig Housing by Cooling of the Slurry <i>Holm, M.</i>
17h15-17h30	Achieving a Greater Reduction of Airborne Emissions from Swine Buildings by the Combination of Different Technologies <i>Girard, M., Lévesque, A., Létourneau, V., Pilote, J., Duchaine, C., Godbout, S., Lemay, S.P.</i>
17h30-17h45	Solid Floors With a Slope for Rapid Urine Drainage: First Results from Ammonia Emission Measurements in Winter <i>Schrade, S., Poteko, J., Zeyer, K., Mohn, J., Zähler, M.</i>

Parallel session <i>(Lamennais Room 2)</i> Modelling Chairpersons: M. Eugène (INRA, France) - A. Bayat (LUKE, Finland)	
16h00-16h15	A Model to Predict Ammonia Emissions from Dairy Cattle Barns Depending on Temperature Variations <i>Sanchis, E., Calvet, S., del Prado, A., Galán, E., Menz, C., Hempel, S., Amon, B., Estellés, F.</i>
16h15-16h30	Effect of Feeding Strategies on Methane Emissions of Dairy Cows Evaluated by MIR Spectrometry <i>Lessire, F., Vanlierde, A., Dehareng, F., Scohier, C., Prévot, Anaëlle, Soyeurt, H., Dufrasne, I.</i>
16h30-16h45	Innovative Database and Its Potential to Realise Large Scale Study to Quantify the Impact of Diet Component on CH ₄ Emitted Daily by Dairy Cows <i>Vanlierde, A., Boulet, R., Colinet, F., Gengler, N., Soyeurt, H., Dehareng, F., Froidmont, E.</i>
16h45-17h00	Effect of Decreasing Methane Emissions in Cattle on Rumen Metabolic Hydrogen Balance <i>Guyader, J., Nozière, P., Doreau, M., Gérard, C., Martin, C.</i>
17h00-17H15	Geep, a Tool for the Farmers to Manage the Gaseous Emissions of their Pig Unit <i>Espagnol, S.</i>

17H45-18H45 Poster session (Vauban Room)

19H30 Dinner

Tuesday, May 23 2017

Session Inventories and Environmental Assessment <i>(Lamennais Room 1)</i> Chairpersons : L. Loyon (IRSTEA, France) - C.M. Groenestein (Wageningen University & Research, Netherlands)	
08h30-08h45	The Emissions of Greenhouse Gases From Ewe Farming in The Region of Slovakia in 2015 <i>Palkovičová, Z., Brestenský, V., Brouček, J.</i>
08h45-09h00	Innovative Feeding Strategies in Pig Production: Incidence on Gaseous Emissions <i>Espagnol, S., Wilfart A., Gaudre D., Tailleur A., Garcia-Launay F.</i>

09h00-09h15	Investigation on the Amount of Odour Nuisance Caused by Pig Farms in the Netherlands <i>Van Elst, T., Driesen, K., Wouters, P., Brusselman, E., Demeyer P.</i>
09h15-09h30	Agricultural Emission Factors of Particulate Matter and Non-Methane Volatile Organic Compounds for Switzerland <i>Bühler, M., Kupper, T.</i>
09h30-09h45	Emissions of VOC from Livestock Production Estimated Based on PTRMS Data <i>Feilberg, A., Liu, D., Hansen, M. J.</i>
09h45-10h00	Gas Emission During Digestates Management : Impact of Digestates Post-Processing Strategies Used with Livestock Effluent Co-Digestion, on Gas Emission, from Digester to Roots. <i>Guiziou, F., Roux, J-C., Girault, R., Mazoyer, J., Nunes, G., Auvinet, N., Saint-Cast, P., Daumoin, M., Leroux, S., Pradel, M.</i>
10h00-10h15	Air Emission Inventories of Cattle Manure Processed at a Biogas Plant: Measured and Estimated Emission Accounting <i>Torrellas, M., Noguerol, J., Riau, V., Burgos, L., Tey, L., Antón, A., Bonmatí, A.</i>
10h15-10h30	Methane from Pig Manure: Estimates of BMP and MCF <i>Groenestein, C.M., Mosquera, J.</i>

Session Measuring Methods (Lamennais Room 2) Chairpersons : M. Mathot (Centre Wallon de Recherches Agronomiques, Belgium) - S. Schrade (Agroscope, Switzerland)	
08h30-08h45	Methane and Ammonia Emission Measurements in a Naturally Ventilated Dairy Freestall Barn Using Specific Data Classification Criteria <i>Schmithausen, A.J., Trimborn, M., Gerlach, K., Südekum, K.-H., Büscher, W.</i>
08h45-09h00	Field Validation of an Open Path Laser to Measure NH ₃ and CO ₂ Concentrations in Naturally Ventilated Livestock Buildings <i>Mosquera, J., Ogink, N.W.M.</i>
09h00-09h15	Laboratory and Field Validation of a New Electro-Chemical Sensor for Continuous Measurement of NH ₃ <i>Melse, R.W., Mosquera, J., Ogink, N.W.M.</i>
09h15-09h30	Evaluation of a photo Acoustic Spectroscopy in Various Livestock Barn Using the HITRAN Database <i>Adamsen, A.P.S.</i>

09h30-09h45	Ammonia Emission from a Bedded Pack Barn for Dairy Cows Using the CO ₂ Mass Balance Method <i>Van Dooren, H.J.C., Mosquera, J., Hol, J.M.G., Blanken, K., Galama, P.J.</i>
09h45-10h00	Assessing Ammonia Reducing Techniques in Beef Cattle by the Use of an Emission Barn <i>Curial, S.A., Van Overbeke, P., Brusselman, E., Demeyer, P., Goossens, K., Vandaele, L., Vangeyte, J., De Campeneere, S.</i>
10h00-10h15	Verification of Emission-Reducing Technologies in Cattle Houses by Optimized Measurement Methods in Naturally Ventilated Animal Houses - Revision of the VERA Test Protocol "Housing Systems" <i>Adamsen, AP., Bjerg, B., Gallmann, E., Grimm, E., Hartung, E., Kai, P., Mosquera, J., Ogink, N., Demeyer, P., Hempel, S., Robin, P., Beckert, I.</i>

10h30-11h00

Coffee Break

Parallel session <i>(Lamennais Room 1)</i> Emission factors and Air quality Chairpersons : S. Lagadec (Chambre d'Agriculture de Bretagne, France) - R. Gates (University of Illinois, USA)	
11h00-11h15	Emission of Greenhouse Gases from Swine Manure Storage <i>Xiang, R. B., Feng, L.</i>
11h15-11h30	Gaseous Emissions of 3 Treatments (Control, Covered, Covered+Compacted) Solid Manure Heaps at Storage <i>Lorinquer, E., Charpiot, A., Robin, P., Lecomte, M.</i>
11h30-11h45	Ammonia Emissions from Slurry Stores <i>Kupper, T., Häni, C., Eugster, R., Sintermann, J.</i>
11h45-12h00	Evaluation Of GHG and Ammonia in the Process of Composting Chicken Carcasses in Rotating Drums <i>Oliveira, M.M., Schell, D.R., Smozinski, N.G., Belli Filho, P., Oliveira, P.A.V.</i>
12h00-12h15	Alfam2: a Database on Ammonia Emission from Field-Applied Manure <i>Hafner, S. D., Pacholski, A., Bittman, S., Burchill, W., Bussink, W., Chantigny, M., Carozzi, M., Genermont, S., Häni, H., Hansen, M. N., Huijsmans, J., Hunt, D., Kupper, T., Lanigan, G., Loubet, B., Misselbrook, T., Meisinger, J. J., Neftel, A., Nyord, T., Pedersen, S. V., Rochette, P., Sintermann, J., Thompson, R. B., Vermeulen, B., Vestergaard, A., Voylokov, P., Williams, J. R., Sommer, S. G.</i>

12h15-12h30	Comparison of Ammonia and Odour Emissions during and Following Digested Manure Landspreading <i>Girault, R., Roux, J.C., Mazoyer, J., Nunes, G., Auvinet, N., Leroux, S., Daumoin, M., Guiziou, F.</i>
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Parallel session <i>(Lamennais Room 2)</i> Measuring Methods Chairpersons : M. Hassouna (INRA, France) - H.J Van Dooren (Wageningen University & Research, Netherlands)	
11h00-11h15	Advances in the Development of Passive Flux Sampling to estimate N ₂ O emissions from Livestock Buildings <i>Larios, A.D., Godbout, S., Palacios, Araceli D. H., Zegan, D., Alvarado, A., Redicala, B., Avalos Ramírez, A., Kaur Brar, S., Sandoval-Salas, F.</i>
11h15-11h30	Influence of Calibration on Greenhouse Gases Measurement <i>Peiren, N., Van Wesemael, D., Vandaele, L., De Campeneere, S.</i>
11h30-11h45	Reduced Direct Measuring Methods in the Ridge Vent of a Dairy Barn <i>De Vogeleer, G., Demeyer, P., Van Overbeke, P., Pieters, J.G.</i>
11h45-12h00	Monitoring Sulfur Processes with ³³ S Isotope Labelling and PTR-MS in Swine Manure <i>Dalby, F., Hansen, M.J., Feilberg, A.</i>
12h00-12h15	Assessments of Methodological Differences of NH ₃ Emission Measurements using Micrometeorological Techniques <i>Hensen, A., Berkhout, S., Haaima, M., Häni, C., Bell, M., Flechard, C., Neftel, A.</i>
12h15-12h30	Quantifying Ammonia Emissions from Livestock Buildings and Whole Farms by Mobile Concentration Measurements and Inverse Dispersion Modelling <i>Bell M., Flechard C.</i>

12h30-14h00

Lunch

Parallel Session 1 <i>(Lamennais Room 1)</i> Emission Factors And Air Quality Chairpersons : T. Eglin (Ademe, France) – F. Estelles (Institute of Animal Science and Technology, Spain)	
14h00-14h15	Dust Concentrations, and Dust Exposure of Workers in the Air of Poultry Houses during Specific “Working Task” <i>Brame, C., Rousset, N., Galliot, P., Cleuziou, A-C., Goizin, G., Hassouna, M., Huneau-Salaün, A.</i>

14h15-14h30	Ammonia and Particulate Matter Concentration during the Weaning of Piglets in 19 Brittany Pig Farms <i>Lagadec, S., Guingand, N., Gabrysiak, L., Guinot, L., Hassouna, M.</i>
14h30-14h45	Dust, Ammonia and Greenhouse Gas Emissions Associated with Three Housing Types for Laying Hens <i>Philippe, F.X., Larouche, J.P., Lefrançois, M., Cinq-Mars, D., Palacios, J., Pelletier, F., Mahmoudi, Y., Godbout, S.</i>
14h45-15h00	Worker Exposure to Ammonia and Particles during Husbandry Procedures <i>Guingand, N., Gabrysiak, L., Lagadec S., Guinot, L., Hassouna, M.</i>
15h00-15h15	Acquisition of Ammonia and GHG Emission Factors under French Livestock Conditions <i>Guingand, N., Loiseau, D., Hassouna, M. Eglin T.</i>
15h15-15h30	Ammonia and Greenhouse Gas Emissions at Post-Weaning Commercial Pig Farms at Brazil <i>Tavares, J.M.R., Belli Filho, P., Benoliel, M.A.; Coldebella, A., Robin, P., Oliveira, P.A.O.</i>

Parallel Session (Lamennais Room 2) Measuring Methods Chairpersons : S. Godbout (IRDA, Quebec)- S. Calvet (Institute of Animal Science and Technology, Spain)	
14h00-14h15	Evaluation of Backward Lagrangian Stochastic Dispersion Modelling for NH ₃ : Including a dry Deposition Algorithm <i>Häni, C., Voglmeier, K., Jocher, M., Ammann, C., Neftel, A., Kupper, T.</i>
14h15-14h30	Continuous Measurement of N ₂ O Emissions from Plot-Size Agricultural Fields <i>Grant, R.H., Johnston, C.T., Lin, C.-H., Vyn, T.J.</i>
14h30-14h45	Ammonia Emission Measurements of an Intensively Grazed Pasture <i>Ammann, C., Voglmeier, K., Häni, C., Jocher, M.</i>
14h45-15h00	Quantification of Small Scale Nitrous Oxide Emissions and Comparison with Field-Scale Emissions of a Rotational Grazing System <i>Voglmeier, K., Jocher, M., Menzi, K., Ammann, C.</i>
15h00-15h15	Sulphur Hexafluoride Tracer Technique for Measuring Methane Directly from Rumen of Dairy Cows Validated with Respiration Chambers <i>Bayat, A.R., Stefanski, T., Luukkonen, T., Kairenius, P., Leskinen, H., Vilkki, J.</i>

15h30-16h00

Coffee Break

Parallel Session (Lamennais Room 2) Emission Factors – Air quality Chairpersons : F.X. Philippe (Faculty Of Veterinary Medicine, University Of Liège, Liège, Belgium) – G. Zhang (Aarhus University, Denmark)	
16h00-16h15	Ammonia Emission Factors in French Poultry Housing (Boilers and Turkeys) <i>Brame, C., Gaillot, P., Hassouna, M., Ponchant, P.</i>
16h15-16h30	Ammonia Emissions in Commercial Broiler Dark House in South of Brazil <i>Angnes, G., Oliveira, P.A.V., Robin, P., Hassouna, M., Coldebella, A., Romaneli, T. L.</i>
16h30-16h45	Low Frequency Aeration of Pig Slurry Affects Slurry Characteristics and Emissions Of Greenhouse Gases and Ammonia <i>Calvet, S., Hunt, J., Misselbrook, T.</i>
16h45-17h00	Gas Emissions from Deep Litter Systems for Dairy Cattle in Contrasted Feeding Situations <i>Edouard, N., Rossini-Almeida, J.G., Alves, T.P., Lamberton, P., Lorinquer, E.</i>
17h00-17h15	Assessment of Emission Factors for Different Dairy Cattle Housing Systems in Germany – Measurement Approach And First Results <i>Eurich-Menden, B., Wolf, U., Wulf, S., Grimm, E.</i>
17h15-17h30	Emissions of Ammonia from Two Types of Dairy Barns Measured Using Cavity Ring Down Spectroscopy (CRDS) <i>Kai, P., Kasper, P., Feilberg, A.</i>
17h30-17h45	Elfe, A Database To Determine Gaseous Emission <i>Vigan, A., Guingand, N., Espagnol, S., Hassouna, M., Lorinquer, E., Ponchant, P., Lagadec, S., Brame, C., Edouard, N., Genermont, S., Loyon, L., Eugène, M., Klumpp, K., Fiorelli, J.L., Mathias, E., Legall, C., Cohan, J.P., Eglin, T., Robin, P.</i>
<i>Conference closure</i>	

Wednesday, May 24 2017

Technical Tours : Rennes or Guernevez