**PROGRAM conference Functional Ecology JEF AnaEE France (28-30 March 2017)**

**Keynote presentations 30 mn; regular presentation 15 mn** (including discussion); speaker

**TUESDAY March 28th afternoon**

**Introduction to the conference 14:00 – 14:10**

Jacques Roy, Jean Clobert, André Chanzy

**SPECIES RESPONSES 14h10 – 16:10**

**Searching for the perfect mesophyll: a trade-off between productivity and stress resistance?**

**Jaume Flexas** et al.

Acclimation and vulnerability to experimentally increased drought in a Mediterranean evergreen oak

Jean-Marc Limousin, Jean-Marc Ourcival, Morine Lempereur, Serge Rambal, Florent Mouillot, Richard Joffre

Thermal acclimation of photosynthesis in wheat.

Maeva Baumont, Boris Parent, Bertrand Muller, Pierre Martre

Linking hard and soft traits: Physiology, morphology and anatomy interact to determine habitat affinities to soil water availability in herbaceous dicots.

Michaël Belluau, Bill Shipley

On the climate and resource-limitation of fruiting in European temperate broadleaved forests (Fagus sylvatica, Quercus petraea and Q. robur)

François Lebourgeois, Nicolas Delpierre, Eric Dufrêne, Sébastien Cecchini, Luc Croisé, Sébastien Macé, Manuel Nicolas

**16h10 – 16h30 Coffe-break**

**SPECIES RESPONSES (continues) 16h30 – 17h30**

Evaluation of genetic variability and local adaptation of silver fir (Abies alba) from reciprocal transplant experiments along altitudinal gradients.

Christian Pichot, Anne Latreille, Lola Pelte

Physiological responses to environmental gradients in wild populations of lizards

Andréaz Dupoué, Jean-François Le Galliard, Frédéric Angelier, Jean Clobert, Sandrine Meylan

Climate warming reduces gut microbiota diversity in a vertebrate ectotherm

Elvire Bestion, Staffan Jacob, Lucie Zinger, Lucie Di Gesu, Murielle Richard, Joël White, Julien Cote

Flash presentation of posters

17h30 – 18h30 Posters and free time

**18h30 -19h30 Invited address**

**Soil for food security and climate: the 4 per mil initiative**

**Claire Chenu**

**19h30 Coktail**

**WEDNESDAY 29th morning**

**AGRO-ECOLOGY 8h30 – 10h15**

**How can ecology help developing more sustainable agricultural practices?**

**Sébastien Barot**

Crop mixtures: does niche complementarity hold for below-ground resources? An experimental test using rice genotypic pairs.

Germain Montazeaud, Cyrille Violle, Hélène Fréville, Delphine Luquet, Nourollah Ahmadi, Brigitte Courtois, Ilyas Bouhaba, Florian Fort

Optimization of productivity and sustainability of intensive cropping systems through symbiotic nitrogen fixation in agroforestry plantations

Nicolas Marron, Bernard Amiaud, Daniel Epron, Erwin Dalle, Alexandre Laflotte, Séverine Piutti

A plant trait-based response-and-effect framework to assess vineyard inter-row soil management

Elena Kazakou, Guillaume Gried, Aurelie Metay

Control of active bacterial diversity by organic amendment practices and consequences on volatile organic compound (VOC) emissions from agricultural soil to the atmosphere

Kevin Potard, Cécile Monard, Nathalie Le Bris, Jean-Pierre Caudal, Jean-Luc Le Garrec, Françoise Binet

**10h15-10h45 Coffee break and posters**

**AGRO-ECOLOGY (continues) 10h45 – 11h00**

**I**mpact of land management on productivity of agro-ecosystems of West-Africa: a meta ecosystem approach

Anne Bisson, Simon Boudsocq, Tanguy Daufresne, Céline Casenave, Raphael Manlay, Sébastien Barot, Dominique Masse

Flash presentation of posters agro-ecology session

**SPECIES RESPONSES (continues) 11h00 – 12h15**

Epigenetic transgenerational herbivory defences are modified by variation in environment across generation

Mar Sobral

Altitudinal colonisation and adaptability to hypoxia: an ignored constraint of climate change on biodiversity

Jérémie Souchet, Gaëlle Micheli, Coralie Bossu, Fabien Aubret

Climatic niche shift of an invasive shrub, a combined modeling and common garden approach from individuals to population levels.

Mathias Christina, Anne Atlan, Mark Bakker, Nathalie Udo, Gaël Cardinal, Maud Champagne, Céline Gire, Sylvie Niolleta, Alan Leckie, Jianming Xue, Maya Gonzalez

Phenotypic plasticity, global change, and their influences on food-web persistence

Arnaud Sentis, Amrei Binzer, David Boukal

Coordination among reproductive phases in 135 plant species growing under Mediterranean climate conditions

Jules Segrestin, Marie-Laure Navas, Eric Garnier

**12h15 – 14h00 Lunch**

**WEDNESDAY 29th afternoon**

**DIALOG MODELS – EXPERIMENTS 14h00 – 16h00**

**Progress in vegetation modelling through better integration of experiments and modelling**

**Frank Ewert**

Understand trees mortality causes by using a physiological process-based model

Cathleen Petit, Hendrick Davi, S. Oddou-Muratorio

Dilution curve of critical phosphorus concentration in the canopy – a potential tool for dynamic models

Iva Zivanovic, Marina Azzaroli Bleken

Plant water budget: lessons from experimental measurements and modelling on a mixed Mediterranean shrubland under prolonged experimental drought.

Damien Longepierre, Florent Mouillot

Investigating community ecology questions with forest gap models: from species coexistence to diversity-productivity relationships

Xavier Morin

Integrated modelling and ecosystem development.

Cédric Gaucherel, Franck Pommereau

Flash presentation of posters modelling

**16h00- 16h30 Coffee break and posters**

**CROPS/GRASSLANDS AND CLIMATE CHANGE, CONTROLS OF COMMUNITY STRUCTURE 16h30 – 17h30**

Interactive effects of environmental drivers may alter the crop responses to expected climate change

Karel Klem, Petr Holub, Otmar Urban

Grassland response to future extreme events

Catherine Picon-Cochard et al.

Bottom-up and top-down control of epibiont burden on zooplankton: consequences for phytoplankton communities in aquatic ecosystems

Gérard Lacroix, Marco A. Rodriguez, Elisa Thebault, Andrea Bertolo

Sensitivity of lake food web structure and functioning to strong variations in fish abundances

Marine Lemaire, Jérémy Lobry, Orlane Anneville, Jean Guillard

 **AnAEE France SERVICES 17h30 – 18h30**

Jean Clobert, André Chanzy

**19h00 – 21h00 Booths AnaEE France, Posters, Coktail dinner**

**THURSDAY 30th morning**

**STOECHIOMETRY 8h30 – 10h15**

**Thirty years of Ecological Stoichiometry: recent conceptual changes and research perspectives**

**Michaël Danger**

Phosphorus control on soil C cycling in an Amazonian rainforest

Stephan Hättenschwiler, Nicolas Fanin, Sandra Barantal, Johanne Nahmani, Nathalie Fromin

Water stress in soil: Is there an impact on microbial biomass CNP in a Mediterranean agroforestry system?

Esther Guillot, Isabelle Bertrand, Philippe Hinsinger

Plant interactions as biotic drivers of plasticity in leaf litter traits and decomposability of a dominant tree species (Quercus petraea) along an abundance gradient: consequences for forest floor dynamics and C storage

Ludovic Henneron, Matthieu Chauvat, Frédéric Archaux, Fabrice Bureau, Yann Dumas, François Ningre, Claudine Richter, Philippe Balandier, Michaël Aubert

Rainfall reduction increases soil carbon and nitrogen concentration around fine roots at considerable depth in Eucalyptus grandis plantation in a deep Ferralsol in Brazil.

Céline Pradier, Philippe Hinsinger, Jean-Paul Laclau, Jean-Pierre Bouillet, Irae Guerrini, José Gonçalves, Verónica Fandiño, Cassio Abreu-Junior, Christophe Jourdan

**10h15 – 10h45 Coffee break and posters**

**STOECHIOMETRY (continues) 10h45 – 11h00**

Quelles implications du mélange d'essences dans les peuplements forestiers sur les retours aux sols des nutriments ?

Nathalie Korboulewsky, Maude Toïgo, Catherine Menuet, Thomas Perot

**COMMUNITY RESPONSE TO GLOBAL CHANGES 11h00 – 12h15**

Plant-soil feedbacks in alpine meadow communities under warming climate

Tamara Münkemüller, Wilfried Thuiller

The drivers behind non-native plant invasion in mountains

Jonas Lembrechts, Jonathan Lenoir, Martin Nuñez, Anibal Pauchard, Ann Milbau, Ivan Nijs

Bacterial "social" network across the French national territory

Battle Karimi, Nicolas Chemidlin-Prevost Bouré, Sébastien Terrat, Samuel Dequiedt, Nicolas Saby, Mélanie Lelièvre, Virginie Nowak, Claudy Jolivet, Dominique Arrouays, Patrick Wincker, Corinne Cruaud, Antonio Bispo, Pierre-Alain Maron, Lionel Ranjard

Flash presentation of posters

**12h15 – 14h00 Lunch**

**THURSDAY 30th afternoon**

**NEW TOOLS AND APROACHES 14h00 - 16 h00**

Genotypic variability enhances the reproducibility of an ecological study

Alexandru Milcu, Jacques Roy

Using electric resistivity tomography as a proxy for the total water ressource available to Mediterranean forests

Simon Carrière, Nicolas Marti - St Paul, Jean-Marc Limousin, Claude Doussan, Olivier Marloie, Jean-Marc Ourcival, Hendrik Davi, Thierry Gauquelin, Ilja Reiter, Guillaume Simioni

Assessing structural-functional traits of ecosystems with terrestrial laser scanning

Mathieu Dassot

Back to the field! Biofunctool: An in-field package to assess soil quality based on soil functioning

Alain Brauman, Alexis Thoumazeau, Cécile Bessou, Frédéric Gay, Jean Trap, Benoît Jaillard

Contribution of M-POETE (ANAEE) to innovation in truffle industry

Flora Todesco, Damien Berlureau, Bruno Robin, Dominique Barry, Claude Murat

Predicting spring phenology of trees in the Alps using data from a citizen science program. Comparing correlative and process-based models.

Daphné Asse, Isabelle Chuine, Christophe Randin

Epidemiological analysis: a new approach for forest protection against ozone

Pierre Sicard, A. Anav, O. Badea, E. Carrari, L. Dalstein-Richier, A. De Marco, S. Fares, Y.Hoshika, E. Paoletti, D. Silaghi

Towards a thesaurus of plant characteristics: an ecological contribution

Eric Garnier, Ulrike Stahl, Marie-Angélique Laporte, Jens Kattge, Stefan Klotz

**16h00- Coffee-break**