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L'INSTITUT agro Montpellier

Programme | Program

LES 30 ANS DU LEPSE

Laboratoire d'Écophysiologie des Plantes sous Stress Environnementaux

https://www.inrae.fr/evenements/30-ans-du-lepse

21 & 22 NOVEMBRE 2023

2 place Pierre Viala
MONTPELLIER

Célébration des 30 ans du LEPSE

21 Novembre 2023 8h30 - 12h20

Amphithéâtre Philippe Lamour, Institut Agro Montpellier

2 place Pierre Viala - MONTPELLIER

08h30 ACCUEIL

09h00 Mot de bienvenue
Pierre MARTRE, Directeur du LEPSE

09h10 Le LEPSE sur le centre INRAE Occitanie-Montpellier
Sylvain LABBÉ, Président du Centre INRAE Occitanie-Montpellier

09h20 Le LEPSE dans l'Institut Agro Montpellier
Carole SINFORT, Directrice de l'Instiut Agro Montpellier

09h30 Aux origines du LEPSE
Jacques WERY, Directeur de la Politique Scientifique et Partenariale de l'Institut Agro Montpellier

09h40 Le projet scientifique initial, de la "commande" aux intuitions collectives
François TARDIEU, Ex Directeur du LEPSE

09h50 L'Institut de Biologie Intégrative des Plantes : une nouvelle discipline à bord d'un nouveau bâtiment ?
Thierry SIMMONEAU, Ex Directeur du LEPSE

10h00 Phénotypage : quand l'écophysiologie change de nom avant de se marier avec la génétique
Bertrand MULLER, Ex Directeur du LEPSE

10h10 Film : Les installations expérimentales et les métiers du LEPSE
Myriam DAUZAT, Directrice Adjointe du LEPSE

10h20 PAUSE CAFÉ

10h50 Le LEPSE à l'INRAE
Christian HUYGHE, Directeur Scientifique Agriculture, INRAE

11h00 Trajectoire du LEPSE dans le département Environnement & Agronomie
Laurent BRUCKLER, Ex Chef de Département Environnement & Agronomie, Ex Président du Centre INRA de Montpellier

11h10 Le LEPSE et la stucturation nationale et européenne du phénotypage
Stéphane AYMERICH & Gilles AUMONT, Délégués aux infrastructures de recherche d'INRAE

11h20 Le LEPSE vu par le département Biologie et Amélioration des Plantes
Peter ROGOWSKY, Chef de Département Adjoint Biologie et Amélioration des Plantes

11h30 Le LEPSE vu par le département AgroEcoSystem
Sylvain PELLERIN, Chef de Département Adjoint AgroEcoSystem

11h40 Impacts des recherches conduites au LEPSE
Eric JALLAS, Président itk

11h50 Le LEPSE face aux enjeux de diversification et d'adaptation au changement climatique
Pierre MARTRE, Directeur du LEPSE

12h00 Conduite de la culture : l'oubliée des analyses génétiques
Aude COUPEL-LEDRU, Chargée de Recherche INRAE, LEPSE

12h10 Sur les épaules du LEPSE : recherche de convergence pour l'adaptation des cultures
Randall WISER, Directeur de Recherche INRAE, LEPSE

12h20 FIN

From Plant ecophysiology to crop yield
A tribute to the career of François Tardieu

November 21, 2023 14h15 - 18h10

Amphithéâtre Philippe Lamour, Institut Agro Montpellier

2 place Pierre Viala - MONTPELLIER

14h15 - ARRIVAL AND REGISTRATION

14h30 Welcome address
Bertrand MULLER & Pierre MARTRE, LEPSE, INRAE, Montpellier, France

14h35 The need for an agricultural revolution and a role for plant science
Bill DAVIES, Lancaster University, The UK

14h52 From one to infinity. François and population size expansion in genetic studies of environmental adaptation
Alain CHARCOSSET, GQE, INRAE, Le Moulon, France

15h09 Crop ecophysiology and modelling - François and the nexus
Graeme HAMMER, University of Queensland, Brisbane, Australia

15h26 Francois: A good friend doing "hard science"
Jean-Marcel RIBAUT, Integrated Breeding Platform, Mexico

15h43 Harnessing the power of science to overcome the challenges of the Anthropocene: LEPSE and the legacy of François Tardieu
Wendy SILK, University of California Davis, USA

16h00 COFFEE BREAK

16h30 François in Belgium
Xavier DRAYE, Earth and Life Institute, Agronomy, Université catholique de Louvain, Louvain-la-Neuve, Belgium

16h47 What is a good model?
Fred VAN EEUWIJK, Biometris, Mathematical and Statistical Methods, Wageningen University and Research, Wageningen, The Netherlands

17h04 (Title to be confirmed)
Alain MURIGNEUX, Limagrain Europe, Chappes, France

17h21 A 15-year cruise with François on the ocean of plant responses to temperature, churned by spatial and temporal scales
Boris PARENT, LEPSE, INRAE, Montpellier, France

17h38 Can we really contribute to improve yield in dry areas
François TARDIEU, LEPSE, INRAE, Montpellier, France

18h10 ADJOURNED

Plant ecophysiology in the face of innovations and climate change

November 22, 2023 08h00 – 18h00

Amphithéâtre Philippe Lamour, Institut Agro Montpellier

2 place Pierre Viala – MONTPELLIER

08h00 - ARRIVAL AND REGISTRATION

08h30 Welcome address
Pierre MARTRE, LEPSE, INRAE, Montpellier, France

Session I: How can big data improve our understanding of plant ecophysiology?
Chairs: Anne PELLEGRINO / Boris PARENT

08h40 Keynote: Artificial Intelligence recipes for improving our understanding of crop growth and yield forecasting
Ioanis ATHANASIADIS, Wageningen Data Competence Center and Geo-Information Science & Remote Sensing Lab, Wageningen University and Research, Wageningen, The Netherlands

09h05 (Title to be confirmed)
(Speaker to be confirmed)

09h20 Plant modeling: learning plants or teaching machines
Christian FOURNIER, LEPSE, INRAE, Montpellier, France

09h35 Make the link between metabolism and plant performance through modelling
Yves GIBON, BFP, INRAE, Bordeaux, France

09h50 Panel Discussion

10h20 - COFFEE BREAK

Session II: Ecophysiology and modelling, driving advances in plant phenomics
Chairs: Christine GRANIER / Bertrand MULLER

10h50 Extracting relevant traits from phenotyping platforms: Beyond high-throughput
Llorenç CABRERA-BOSQUET, LEPSE, INRAE, Montpellier, France

11h15 Using model outputs to prototype new phenomic methods and machine learning techniques
Scott CHAPMAN, University of Queensland, Brisbane, Australia

11h30 Assessing crop plants stress response by non-invasive phenotyping
Kerstin NEWMANN, IPK, Gatersleben, Germany

11h45 Phenotyping across borders – national to international, below to above ground, controlled to natural environment
Astrid JUNKER, Syngenta, Halle, Germany

12h00 Panel Discussion

12h30 - LUNCH

Session III: Renewing ecophysiological approaches to meet the challenges of climate change
Chairs: Jessica BERTHELOOT / Benoit PALLAS

14h00 Extreme climatic events and plant production: new challenges for plant ecophysiologists?
Thierry SIMONNEAU, LEPSE, INRAE, Montpellier, France

14h25 Does a first thermal stress impact plant response during a second stress? A case study in Sorghum
Christine GRANIER, AGAP Institut, INRAE, Montpellier, France

14h40 A plant micro-hydrological journey to phenotypes : There and back again
Valentin COUVREUR, Earth and Life Institute, Agronomy, Université catholique de Louvain, Louvain-la-Neuve, Belgium

14h55 Challenges in assessing climatic risk to crops
Heidi WEBBER, ZALF, Müncheberg, Germany

15h10 Panel Discussion

15h40 COFFEE BREAK

Session IV: Contributions of ecophysiology and modeling to GxE analysis: from platforms to fields
Chairs: Aude COUPEL-LEDRU / Randall WISSER

16h10 Understanding canopy dynamics in the context of phenotyping for improved physiological traits
Erik MURCHIE, Division of Plant and Crop Sciences, School of Biosciences, University of Nottingham, UK

16h35 (Title to be confirmed)
Jérôme ENJALBERT, GQE, INRAE, Le Moulon, France

16h50 Integrating traits at different scales to predict GxE: where statistics and ecophysiology meet
Daniela BUSTOS KORTS, Universidad Austral de Chile, Valdivia, Chile

17h05 Walking back and forth among scales to achieve an impact in the field
Vincent VADEZ, IRD, Dakar, Sénégal

17h20 Panel Discussion

17h50 Concluding regmarks

18h00 SEMINAR ADJOURNED

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