

Effectome meeting VII, October 8-10 2014, Lauret, France

Wednesday October 8th

14h00-14h15 Welcome and Introductory Remarks by the Organizers

Session 1: Bacteria & Viruses

Chair : Boris Szurek, Valerie Nicaise & Nemo Peeters

14h15-15h00. Heribert Hirt (URGV, Evry, FR) Arabidopsis interactions with beneficial and pathogenic microbes.

15h00-15h20. Dominique Trémoussaygue (INRA/CNRS LIPM, Toulouse, FR) Molecular Mechanism of NLR immune receptor activation.

15h20-15h40. Camilo Lopez (Universidad Nacional de Colombia) Genetic mapping of QTLs associated with cassava bacterial blight resistance in *Manihot esculenta* Crantz.

15h40-16h00. Tristan Boureau (Université d'Angers, FR) The acquisition of a Type 3 Secretion System as a first step for emergence of novel pathogenic strains of *Xanthomonas*.

16h00-16h20. Mathilde Hutin (IRD, Montpellier, FR) Screening of African wild rice diversity reveals a new source of broad resistance against *X. oryzae* pv. *oryzae* due to impaired *SWEET14*-mediated susceptibility

16h20-16h45: Break

16h50-17h10 Fabien Lonjon (INRA/CNRS LIPM, Toulouse, FR) The *Ralstonia Solanacearum* secretome: Type III effectors, Type III associated proteins and their role in pathogenicity

17h10-17h30 Céline Pesce (IRD, Montpellier, FR) *Xanthomonas translucens* – do TAL effectors contribute to pathogenicity?

17h30-17h50 Pierre Buscail (INRA/CNRS LIPM, Toulouse, FR) Regulate and be regulated: tight control of plant defence responses by the Arabidopsis transcription factor MYB30

17h50-18h10 Laurent Noel (INRA/CNRS LIPM, Toulouse, FR) *Xanthomonas campestris* effectors delivery: where and when?

19h00-20h00: Apéritif & Poster viewing

20h15: dinner

Thursday October 9th

8h30-9h15. Uzma Hasan (INSERM Lyon, France) Human Toll Like Receptor 9 deregulation by oncoviruses

9h15-9h35 Valerie Nicaise (INRA Bordeaux, France) Deciphering plant antiviral PTI pathways and plant virus effectors

Session 2: Fungi & Oomycetes

Chair : Elodie Gaulin, Thomas Kroj & Sebastien Duplessis

9h35-10h20. Natalia Requena (Karlsruhe Institute of Technology, Germany) Assigning symbiotic functions to putative effectors from arbuscular mycorrhizal fungi

10h20-10h45: Break

10h50-11h10 Laurent Kamel (LRSV, Toulouse, France) Involvement of effectors in arbuscular mycorrhizal symbiosis establishment

11h10-11h30. Claire Veneault-Fourrey (Université de Lorraine/INRA, France) The Effector Protein MiSSP7 of the Mutualistic Ectomycorrhizal Fungus *Laccaria bicolor* Interacts with *Populus JAZ* Proteins

11h30-11h50. Benoit Calmes (INRA Angers, France) The ROAD MOVIE project - Resistance Of Apple against Diseases : Mechanisms of Virulence and Identification of Effectors

11h50-12h10. Ludovic Bonhomme (INRA UMR GDEC, Clermont-Ferrand, France) Using SILAC strategy to identify protein effectors in the wheat-Fusarium graminearum pathosystem

12h10-12h30. Jessica L. Soyer (INRA/Max Planck Institute) Epigenetic hotspots as ecological niches for pathogenicity related genes?

LUNCH 12h40 – 14h00

14h15-14h35. Przemyslaw Bidzinski (BGPI Montpellier, France) Drought impact on the expression of the plant defence arsenal and fungal aggressiveness in the interaction between *Magnaporthe oryzae* and rice

14h35-14h55. Benjamin Petre (The Sainsbury Laboratory & INRA Nancy) A small secreted protein of the leaf rust fungus targets plant chloroplasts.

14h55- 15h15. Guillaume Robin (BIOGER, INRA/AgroParisTech, France) Functional studies of putative effectors of *Colletotrichum higginsianum*

15h15-15h35. Diana Ortiz (INRA-CIRAD, Montpellier, France) The rice NB-LRR protein RGA5 recognizes the *Magnaporthe oryzae* effector AVR-Pia by direct binding

15h35- 15h55. Clémence Plissonneau (INRA BIOGER, France) Interaction between avirulence genes *AvrLm3* and *AvrLm7* of the phytopathogenic fungus *Leptosphaeria maculans*

15h55-16h20: Break

16h25- 17h10. Marco Thines (Goethe-Universität, Germany) Effector evolution and host jumps - insights from the genomes of oomycetes and smut fungi

17h10-17h30. Frederic Brunner (ZMBP-Eberhard Karls University Tübingen, Germany) Comparative screen for suppression of early flg22-triggered immunity in tomato and Arabidopsis identifies functionally redundant RXLR effectors from *Phytophthora infestans*

17h30-17h50. Graham Motion Computational identification and functional characterisation of candidate DNA binding effectors in *Phytophthora*

17h50-18h10. Michiel Pel (Université Toulouse III Paul Sabatier, France) Functional analysis of crinkler effectors from the plant pathogenic oomycete *Aphanomyces euteiches*

18h15-19h15. Promenade

19h15-20h15: Apéritif & Poster viewing

20h30: dinner

Friday October 10th

Session 3: Insects & Nematodes

Chair: Bruno Favery & Akiko Sugio

8h30-9h15. Cynthia Gleason (Georg-August-Universität Göttingen, Germany) Identifying novel root-knot nematode genes and uncovering their plant targets and potential roles in plant susceptibility.

9h15-9h35. Nhat My Truong (INRA Sophia Antipolis/UNS/CNRS, France) Characterization of root-knot nematode effectors targeted to the nuclei of giant cells and their plant targets

9h35-10h05: Break

10h05-10h25. Maelle Jaouannet (James Hutton Institute, UK) Plant Host Responses to Aphids

10h25-10h45. Endrick Guy (INRA Rennes, France) Characterization of aphid saliva proteins that can be involved in host plant specialization

10h45-11h05. Akiko Sugio (INRA Rennes, France) Plant-aphid-symbiont interactions--a new field of effector research?

Concluding Remarks by the Organizers

Lunch at Auberge du Cèdre or Lunch packages

