



XVII School Of Pure And Applied Biophysics I School Of Plant Biology On RENEWABLE ENERGY AND BIOFUELS: A BIOPHYSICAL AND BIOCHEMICAL APPROACH

GENERAL INFORMATION

Location: Campo Santo Stefano, Venice, Italy

Dates: January 28th – February 1st, 2013

No. of participants: max. 30 PhD students & post docs

Meeting venue

The School will be held in the magnificent Palazzo Franchetti, located in the historical centre of Venice.

Palazzo Cavalli Franchetti is the conference center of the “Istituto Veneto di Scienze, Lettere ed Arti” (IVSLA) Venetian Institute for Sciences, Humanities and Arts. www.istitutoveneto.it



Aim of the school

The school focuses on the biological production of renewable fuels. The school offers the audience the possibility to investigate the present different possibilities for biofuels production focusing on theoretical limits and challenges for future research through extended lectures from prominent researchers in the field and free informal discussions. The School will be held in the magnificent Palazzo Franchetti, the seat of the Istituto Veneto located in the historical centre of Venice.

Topics

In 2013, the subject of the school is “Renewable energy and biofuels: a biophysical and biochemical approach” covering the following topics:

1. Introduction to biofuels: limits and perspectives
2. Photosynthesis: optimization and artificial photosynthesis
3. Biodiesel from Algae
4. Bioethanol
5. Biological Hydrogen production

Structure of the school

The school is organized in thorough lectures. The programme is organized in 3-4 60' lectures. Each lecture is followed by a discussion. This structure will give a wide space for free discussion within the day-by-day programme and during the breaks. A poster session will be held for students to present their activity. More information can be found in the school [website](#).

Accommodation

Speakers and attendees will stay in the same guest house for an easy and informal exchange.

Cultural Center Don Orione Artigianelli

Zattere Dorsoduro 909/A

30123 Venice, Italy

Tel: +39 0415224077

info@donorione-venezia.it, <http://www.donorione-venezia.it/en/>

Information on Registration and Participation fees

Registration open until: 30 November 2012

Application documents: CV, [registration form](#) by email to: tomas.morosinotto@unipd.it

Applicants are admitted to the school by the Scientific Committee based on the information provided in the application form (short curriculum vitae).

The results of the selection will be communicated individually by e-mail (or phone).

Participation fees:

EUR 350, including attendance and 5 nights in the guest house

EUR 150, for students who do not need any accommodation.

Payment must be performed within two weeks of notification of admission.

Speakers

J. Barber London (UK)

R. Bassi Verona (I)

A. Bertuccio Padova (I)

F. Cervone Roma (I)

P. Costantini Padova (I)

S. Ferrari Roma (I)

M Ghirardi NREL, Denver (USA)

A. Grossmann Stanford (USA)

O. Kruse Bielefeld (Ger)

W. Lubitz Mulheim (Ger)

M. Pauly UC Berkeley (USA)

Supporting organisations

SIBPA (Italian Society of Biophysics (SIBPA)), SIBV (Italian Society of Plant Biology), University of Padua and IVSLA, Venetian Institute for Sciences, Humanities and Arts.

Organizing Committee

Roberto Bassi (Roberto.bassi@univr.it), Alberto Bertuccio (alberto.bertuccio@unipd.it), Felice Cervone (felice.cervone@uniroma1.it), Giorgio M. Giacometti, (Director of the school, gcometti@bio.unipd.it), Tomas Morosinotto (tomas.morosinotto@unipd.it).

XVII SCHOOL OF PURE AND APPLIED BIOPHYSICS

I SCHOOL OF PLANT BIOLOGY

On Renewable energy and biofuels: a biophysical and biochemical approach

2013, January 28th - February 1st

Preliminary program

Monday 28th January	9:00	School opening	Wednesda y 30th January	9:00	Lecture 9
	9:30	Lecture 1		10:30	Coffee break
	11:00	Coffee break		11:00	Lecture 10
	11:30	Lecture 2		12:30	Poster session /general discussion
	14:30	Lecture 3			Free afternoon
	16:00	Coffee break		9:00	Lecture 11
	16:30	Lecture 4		10:30	Coffee break
	18:00	Poster session / general discussion		11:00	Lecture 12
Tuesday 29th January	9:00	Lecture 5	Thursday 31st January	12:30	Poster session /general discussion
	10:30	Coffee break		14:30	Lecture 13
	11:00	Lecture 6		16:00	Coffee break
	12:30	Poster session /general discussion		16:30	Lecture 14
	14:30	Lecture 7		18:00	Poster session / general discussion
	16:00	Coffee break		9:00	Lecture 15
	16:30	Lecture 8		10:30	Coffee break
	18:00	Poster session / general discussion		11:00	Lecture 16
		Friday 1st February	12:30	Final Remarks	

LECTURES

1	Maria Ghirardi (NREL, Golden Co)	Biofuels: state of the art	9	Simone Ferrari (Roma, Italy)	Strategies to improve saccharification of plant biomass
2	Arthur Grossman (Stanford, USA)	Use of light energy by photosynthetic organisms	10	Arthur Grossman (Stanford, USA)	Photo-autrophic and heterotrophic production of biofuels from algae
3	James Barber (I.C. London, UK)	Theoretical limits of photosynthesis	11	Olaf Kruse (Bielefeld, D)	Algae Metabolic engineering for improved biofuels production
4	Maurizio Masi (Milano, Italy)	Photovoltaic energy capture	12	Elisa Corteggiani (Padova, Italy)	A lesson from the algal genome
5	Roberto Bassi (Verona, Italy)	Mechanisms for regulation of photosynthesis	13	Alberto Bertucco (Padova, Italy)	Photobioreactors, design and optimization
6	James Barber (I.C. London, UK)	Artificial photosynthesis, lessons from natural apparatus	14	Maria Ghirardi (NREL, Golden Co)	Biological hydrogen production
7	Felice Cervone (Roma, Italy)	The lignocellulosic biomass utilization	15	Wolfgang Lubitz (Mulheim, D)	Hydrogenase, structure and function
8	Markus Pauly (Berkeley, USA)	Plant Biotechnology for biofuels	16	Paola Costantini (Padova, Italy)	Hydrogenase maturation mechanisms