2010 floramac

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Organisers

CCPA

CIBIO Açores

azorean biodiversity group

Universidade dos Açores

International Symposium FloraMac2010

23-25 September 2010

Ponta Delgada, Azores, Portugal

Funding

DRCTC

DIRECÇÃO REGIONAL DA CIÊNCIA, TECNOLOGIA E COMUNICAÇÕES

International Symposium
FloraMac2010

23-25 September 2010

Ponta Delgada, Azores, Portugal

Organisers

CCPA Centro de Conservação e Protecção do Ambiente
CIBIO Centro de Investigação em Biodiversidade e Recursos Genéticos, Pólo Açores

Organizing Committee

Universidade dos Açores
Luís Silva • Mónica Moura • Graciete Maciel • Ana Isabel Neto • Rosalina Gabriel

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Juli Caujapé Castells

Instituto Nacional de Investigação e Desenvolvimento Agrário
Isildo Gomes • Samuel Gomes

Natural History Museum
Mark Carine • Fred Rumsey

Harvard University, Department of Organismic and Evolutionary Biology
Hanno Schäfer

Instituto de Investigação Científica Tropical
Maria Romeiras

Keynote speakers

David Bramwell
José Luis Martín Esquível
José María Fernández-Palacios
Juli Caujapé Castells
Ricardo Haroun
Robert J Whittaker

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09:30 Opening session
10:00 Session conference
10:30 Coffee break
11:00 Oral presentations
13:00 Lunch
14:00 Session conference
14:30 Oral presentations
15:30 Poster Session / Coffee break
16:00 Oral presentations
18:30 End of the day
19:00 Reception of participants

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10:30 Coffee break
11:00 Oral presentations
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14:00 Session conference
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- BIOCLIMAC project meeting
- Macaronesian Herbaria
- Conservation of Bryophytes in Macaronesia
- Edition of a Flora of Macaronesia

15:30 Coffee break

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09:00 Departure from the University Campus
09:30 Indigenous and non-indigenous species in the south coast
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11:30 Porto Formoso tea plantations
12:30 Terra Nostra Gardens and swimming pool – Indigenous and non-indigenous species
13:30 Traditional Furnas Lunch
15:00 Visit to hotsprings
15:30 Lagoa das Furnas – Indigenous and non-indigenous species
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    Duarte MC, Romeiras MM, Fernandes C, Figueira R, Gomes S, Gomes I & Costa JC
35. **Vascular flora conservation in the coastal zone of Lombo Gordo (S. Miguel, Azores)**
    Dias EF, Jorge JC, Silva LB & Silva L
36. **Vascular flora conservation in the coastal zone of Rosto de Cão (S. Miguel, Azores)**
    Xavier ED, Marques H, Sequeira J & Silva L
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    Pupo-Correia A, Figueiredo A, Aranha JT & Menezes de Sequeira M
39. **Effect of alien herbivores on endemic species of the Canary pine forest**
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41. **Relation between threatened species and habitat conservation in the Canary Islands**
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43. **The effect of natural *vs* artificial substrata on the development of benthonic assemblages inside marinas**
    Torrontegui O, Martins G M, Garcia SA, Prestes ACL, Patarra RF, Álvaro NV, García A, Rosas-Alquicira EF & Neto AI
44. **Experiments on germination of four herbaceous species, endemic to the Azores Archipelago**
    Dias EF & Pereira MJ
45. **Effects of bird ingestion on seed germination of *Vaccinium cylindraceum* Smith, an endemic species of Azores Archipelago**
    Mourato C & Pereira MJ
46. **Main plagues and diseases of *Prunus azorica* (Mouill) Rivas Mart, Lousã, Fern Prieto, E Días, J C Costa & C Aguiar**
    Bernad B, Pereira MJ, Mota J & Viveiros L
47. **Plant physiology research in university-level classes using Azorean endemic species**
    Pereira MJ, Teixeira B, Andrade C & Furtado M
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Development of *Botryocladia macaronesica* (Rhodymeniales, Rhodophyta) under laboratory conditions

León-Cisneros K, Nogueira* EM & Neto AI

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The development of *Botryocladia macaronesica* Afonso-Carrillo, Sobrino, Tittley & Neto, an endemic rare species of the Macaronesian region, was investigated *in vitro* under four irradiance regimes (4, 8, 12 and 16 μmol photons · m-2 · s-1), a temperature of 18 ºC and a photoperiod of 16:8 h. Cultures were initiated from carpospores released by mature cystocarps of gametophytes collected in the field, that produced tetrasporophytes. These were also regenerated by monospores which developed in the same way that the carpospores. Results revealed that both types of spore development can be divided into three stages: division, discoid crust, and erect juvenile germling. The best development was observed under 12 μmol photons · m-2 · s-1.
Keywords: life cycle, monospores, discoid crust.

The effect of natural *vs*. artificial substrata on the development of benthonic assemblages inside marinas

Torrontegui*[1,2,3] O, Martins[1,2,3] GM, Garcia[1,2,3] SA, Prestes[1,2,3] ACL, Patarra[1,2,3] RF, Álvaro[1,2,3] NV, García[1,2,3] A, Rosas-Alquicira[1,2,3] EF & Neto AI[1,2,3]

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The replacement of natural by artificial coastal structures has been highlighted as one the major anthropogenic impacts on the structure and functioning of coastal communities. Here we examine the effect of substratum type on the development of benthonic assemblages in urbanised areas of the Azores. Experimental plates of natural (basalt) and artificial (concrete and fibre glass) substrata (totalling 360 plates) were deployed at 1m depth in each of two sites (10's of m apart) within each of two marinas (km's apart) in São Miguel. We further examined the effect of time of deployment on community succession by deploying half the number of plates each in winter and summer (respectively). Replicate plates will be taken at 1, 2, 3 6 and 12 months to follow community succession. Species richness, evenness, and the cover of dominant functional groups will be sampled in each plate. Preliminary analyses showed that differences in the structure of benthonic assemblages among substrata were already apparent at very early successional stages (1-month old) suggesting that these are mediated by habitat-specific features (e.g. micro-topography) acting on organism settlement.
Keywords: coastal urbanization, benthonic communities, succession.