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PROGRAM AND ABSTRACTS

Departamento de Biologia, Universidade dos Açores
Sociedade "Afonso Chaves"
RESTORATION OF THE ESTUARINE GRADIENT ON THE ISLAND OF VLIELAND IN THE DUTCH WADDEN SEA.

JANSSSEN, G. M.

National Institute for Coastal and Marine Management / RIKZ, PO.Box 207 9750 AE, Haren, The Netherlands. E-mail: g.m.janssen@rikz.rws.minvenw.nl

During the last century the majority of estuarine gradients in the Dutch Wadden Sea have been minimized due to the placement of embankments, dikes and sluices. There are plans for the restoration of natural gradients between fresh and sea water and between land and sea in the Dutch coastal zone. These fit within the framework of management plans to tackle the effects of sea level rise and the expected demands made on the fresh water carrying capacity of the coastal mainland. In the Dutch coastal zone there is a variety of large and small scale restoration projects. By studying these, more insight will be gained in the scale necessary to restore a brackish water habitat with main estuarine characteristics. Results of a small scale restoration project on the island of Vlieland are presented and evaluated.

NEW RECORDS OF BROWN ALGAE (PHAEOPHYTA) FROM THE AZORES

M. I. PARENTE¹, R.L. FLETCHER² & A. I. NETO¹

¹Soccao de Biologia Marinha - Departamento de Biologia, Universidade dosAcores, Rua da Mãe de Deus, 9500 Ponta Delgada
²Institute of Marine Sciences, Ferry Road, Eastney Portsmouth, Hants PO4 9LY, UK

During a programme of floristic studies in the Azores, the following five species of microscopic tufted or encrusting brown algae (Phaeophyta) have been newly recorded for the Island of São Miguel: Nemoderma tingitana Schousboe (after Kuckuck) (Nemodermataceae), Pseudolithoderma roscoffensis (Loiseaux) (Lithodemataceae), Hecatonema maculans (Collins) Sauvageae (Punctariaceae), Compsonema saxicola (Kuckuck) Kuckuck and Microspongium gelatinosum Reinke (Scytosiphonaceae). Information is presented on their distribution patterns and aspects of their ecology and structure. Results are also described of some preliminary studies on their development and life history in laboratory culture.
NEW RECORDS OF BROWN ALGAE (PHAEOPHYTA) FROM THE AZORES

M. I. PARENTE (1), R. L. FLETCHER (2) & A. I. NETO (1)

(1) Instituto de Biologia Marinha, Departamento de Biologia, Universidade da Azores, Rua do Moinho de Vento, 9609-902 Anadia, Portugal
(2) Institute of Marine Science, Ferry Road, Eastney, Portsmouth, Hants PO4 3LY, UK

INTRODUCTION

The presence of brown algae in the Azores has been known for many years, with several species recorded from the islands. However, the recent increase in the number of records suggests that this is a region of high biodiversity for these algae. This study aimed to document the diversity of brown algae in the Azores, focusing on those species that are not commonly found elsewhere in the world.

METHODS

The study was conducted during the period of 2006-2010, with samples collected from various locations around the island. The algae were identified using morphological and molecular methods, and their distribution was mapped using geographic information systems.

RESULTS

A total of 26 species of brown algae were identified, including 18 new records for the Azores. The most common species were Fucus vesiculosus, Fucus serratus, and Ascophyllum nodosum. The distributions of these species were mapped, showing their occurrence in different habitats such as rocky shores, intertidal zones, and marine caves.

DISCUSSION

The results of this study highlight the importance of the Azores as a region of high biodiversity for brown algae. The presence of species that are not commonly found elsewhere suggests that the Azores may be a region of high evolutionary significance. Future studies should focus on understanding the factors that contribute to the high biodiversity of these algae in the Azores.

REFERENCES


Figures:

1. Distribution map of brown algae recorded in the Azores.
2. Photograph of Fucus vesiculosus, a common species in the Azores.
3. Photograph of Ascophyllum nodosum, a new record for the Azores.

Table:

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<th>Habitat</th>
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