



The deep-sea Anguilliformes and Saccopharyngiformes (Teleostei: Elopomorpha) collected on the Brazilian continental slope, between 11° and 23° S

MARCELO R. S. MELO^{1,4}, GUSTAVO W. A. NUNAN², ADRIANA C. BRAGA³ & PAULO A. S. COSTA³

¹ 331 Funchess Hall, Auburn University, Auburn, AL 36849 USA. E-mail: mrs Melo@hotmail.com

² Dept. de Vertebrados, Museu Nacional/UFRJ, Quinta da Boa Vista, Rio de Janeiro, RJ 20940-040 Brazil

³ Laboratório de Dinâmica de Populações, Universidade Federal do Estado do Rio de Janeiro – UNIRIO, Av. Pasteur, 458, ECB sala 410, Urca, Rio de Janeiro, RJ 22290-240 Brazil, Email: acbragaz@hotmail.com; pauloascosta@uol.com.br

⁴ Corresponding author

Abstract

A review of the deep-sea anguilliform and saccopharyngiform eels collected by the French R/Vs *Marion Dufresne* (1987), *Thalassa* (1999, 2000), and the Brazilian *Astro Garoupa* (2003) revealed a great diversity of these groups on the Brazilian continental slope (11–23° S, 19–40° W), in the depth range of 233 to 3450 m. Of the 33 species collected, 13 (39.4%) are being reported for the first time in the western South Atlantic. New taxa are represented by one species recently described and few other are probably undescribed. The most species-rich family in the area was Synphobranchidae (11 species), followed by Congridae (9), Nettastomatidae (5), Nemichthyidae (3), Serrivomeridae (2), Colocongridae (1), Cyematidae (1), and Eurypharyngidae (1). Regarding the vertical species distribution, a gradual transition of species was observed, without any clear break along the slope.

Key words: Western South Atlantic; demersal; pelagic; eels; gulper eels

Resumo

A revisão dos peixes anguilliformes e sacofaringiformes de oceano profundo coletados pelos navios oceanográficos Franceses *Marion Dufresne* (1987) e *Thalassa* (1999, 2000) e brasileiro *Astro Garoupa* (2003) revelou uma grande diversidade de espécies no talude continental brasileiro (11–23° S, 19–40° W), em profundidades entre 233 a 3450 metros. Das 33 espécies coletadas, 13 (39,4%) são reportadas pela primeira vez no Atlântico Sul ocidental. Novos táxons são representados por uma espécie recentemente descrita e algumas outras provavelmente novas. A família mais diversificada na área foi Synphobranchidae (11 espécies), seguida de Congridae (9), Nettastomatidae (5), Nemichthyidae (3), Serrivomeridae (2), Colocongridae (1), Cyematidae (1) e Eurypharyngidae (1). Com relação à distribuição vertical das espécies, foi observada uma transição gradual de espécies, sem a delimitação bem definida de estratos ao longo do talude.

Introduction

Knowledge regarding diversity of the deep-water fish fauna in both the Atlantic and the Pacific Oceans off South America remains poor due to relatively few scientific expeditions and, consequently, little material available in scientific collections (Melendéz & Kong 2000; Figueiredo *et al.* 2002). In the early days of modern deep-water investigations (1873 to 1960), only the British H.M.S. *Challenger*, and the German R/V *Meteor* collected biological samples in the western South Atlantic (WSA) – for more details see Wüst (1964).