

Benthic foraminiferal responses to anthropogenic manipulation on a wild oyster reef

Submitted by Luzia Boss  on Thu, 02/02/2017 - 16:22

Titre	Benthic foraminiferal responses to anthropogenic manipulation on a wild oyster reef
Type de publication	Communication
Type	Communication par affiche dans un congr�s
Ann�e	2016
Langue	Anglais
Date du colloque	03-08/07/2016
Titre du colloque	16th International Meiofauna Conference
Auteur	Geslin, Emmanuelle [1], Parent, Briz [2], B�n�teau, E. [3], Quinchard, Sophie [4], Jauffrais, Thierry [5]
Pays	Gr�ce
Ville	Heraklion

R sum  en anglais

Benthic foraminifera are known to respond quickly to environmental changes. Biological indices are used in marine subtidal areas (Barras et al., 2014) to monitor impacted marine environments (Mojtahid et al., 2006, 2008). Such indices could be useful in transitional marine environments such as estuaries and mudflats where no accurate indices are available. To develop such tools and to improve our knowledge on benthic foraminifera in intertidal environments, we followed the spatial and temporal distribution of benthic foraminifera in Bourgneuf Bay, a coastal bay with a large mudflat situated south of the Loire estuary on French west coast. At this location, wild oyster reefs are present. Partial release of organic and inorganic nutrients through oyster excretion enriches the nutrients flow leading to microphytobenthos bloom around the reef. To show this relation and to understand the relation between the different biological compartments, we analysed the foraminiferal composition of the sediment around the reef before and after anthropogenic manipulation. In July 2014, the oysters of the reef were removed in order to assess their impact on microphytobenthos and meiofauna. In this study, we showed a strong impact of this anthropogenic manipulation on benthic foraminiferal densities and species composition. These results confirmed the strong and quick responses of benthic foraminifera from intertidal areas to environmental changes and showed that intertidal benthic foraminifera can be used as an index to monitor transitional marine environments.

URL de la notice <http://okina.univ-angers.fr/publications/ua15550> [6]

Lien vers le document en ligne <http://isimco.hcmr.gr/> [7]

Liens

- [1] <http://okina.univ-angers.fr/emmanuelle.geslin/publications>
- [2] <http://okina.univ-angers.fr/publications?f%5Bauthor%5D=26037>
- [3] <http://okina.univ-angers.fr/publications?f%5Bauthor%5D=24289>
- [4] <http://okina.univ-angers.fr/s.quinchard/publications>
- [5] <http://okina.univ-angers.fr/publications?f%5Bauthor%5D=25946>
- [6] <http://okina.univ-angers.fr/publications/ua15550>
- [7] <http://isimco.hcmr.gr/>

Publié sur *Okina* (<http://okina.univ-angers.fr>)