



New policies will require new approaches: the case of the Swedish Norway Lobster (*Nephrops norvegicus*) fisheries in the Kattegat and Skagerrak

Hornborg, Sara; Ulmestrand, Mats; Sköld, Mattias; Jonsson, Patrik; Eigaard, Ole Ritzau; Feekings, Jordan P.; Nielsen, J. Rasmus; Bastardie, Francois; Lövgren, Johan

Publication date:
2015

Document Version
Publisher's PDF, also known as Version of record

[Link back to DTU Orbit](#)

Citation (APA):
Hornborg, S., Ulmestrand, M., Sköld, M., Jonsson, P., Eigaard, O. R., Feekings, J. P., Nielsen, J. R., Bastardie, F., & Lövgren, J. (2015). *New policies will require new approaches: the case of the Swedish Norway Lobster (*Nephrops norvegicus*) fisheries in the Kattegat and Skagerrak*. Poster session presented at ICES Annual Science Conference 2015, Copenhagen, Denmark.

General rights

Copyright and moral rights for the publications made accessible in the public portal are retained by the authors and/or other copyright owners and it is a condition of accessing publications that users recognise and abide by the legal requirements associated with these rights.

- Users may download and print one copy of any publication from the public portal for the purpose of private study or research.
- You may not further distribute the material or use it for any profit-making activity or commercial gain
- You may freely distribute the URL identifying the publication in the public portal

If you believe that this document breaches copyright please contact us providing details, and we will remove access to the work immediately and investigate your claim.

Title: New policies will require new approaches: the case of the Swedish Norway Lobster (*Nephrops norvegicus*) fisheries in the Kattegat and Skagerrak

Authors: Sara Hornborg^{1,2}, Mats Ulmestrand², Mattias Sköld², Patrik Jonsson², Ole Ritzau Eigaard³, Jordan Feekings³, J. Rasmus Nielsen³, Francois Bastardie³ and Johan Lövgren²

¹Sustainable Food Production, SP Food and Bioscience, SP Technical Research Institute of Sweden, Box 5401, SE-402 29 Göteborg, Sweden

²Department of Aquatic Resources, Institute of Marine Research, Swedish University of Agricultural Sciences, Turistgatan 5, SE-453 30 Lysekil, Sweden

³DTU-Aqua, Technical University of Denmark, National Institute of Aquatic Resources, Charlottenlund Castle, 2920 Charlottenlund, Denmark

The common fisheries policy within the EU is evolving towards increased complexity, such as a call for coherence with the MSFD requirements and a landing obligation, posing new requirements and challenges to managers and researchers. Therefore, re-evaluations of current practice are necessary as a basis for management actions. The Swedish fishery for Norway lobster (*Nephrops norvegicus*) in the Kattegat-Skagerrak area provides an interesting case study of relevance to emerging policies in the EU. The fishery has three separate segments defined by gear use (mixed trawling, targeted trawling and creeling), and this provides an obvious case for studying effects from alternative quota allocations among gear types. A screening study was therefore done, taking into consideration area-gear interactions in catch rates, to compare the three different fisheries regarding quantified pressures on the target species, the by-catch species, and the seafloor, as well as to qualitatively evaluate social and economic impacts. In the next step, the outcome of various scenarios was quantified. In the studied areas, it was found that creeling offers a substantial reduction of fishing mortality of both undersized *Nephrops* and fish and reduced seafloor pressure per landed kilo of *Nephrops*. Given that the fishing areas in many cases may be interchangeable between gears, promoting a creel expansion at the expense of demersal trawling in Swedish waters would therefore contribute to the integration of fisheries- and environmental management as called for in the new policies.

Keywords: *Nephrops*, discard, fisheries management, trawl fisheries, creels, seafloor impact

Contact author: Sara Hornborg, Sustainable Food Production, SP Food and Bioscience, Box 5401, SE-402 29 Göteborg, Sweden, Sara.Hornborg@sp.se