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## CHANGEMAN

# Ecosystem changes and Channel Management

CHANGEMAN proposal submitted to  
French ANR-SYSTERRA-2010

Submitted : 29 march 2010



# CHANGEMAN team & budget

- ◆ CHANGEMAN team
  - IFREMER (Coordinator);
  - AGROCAMPUS-OUEST;
  - UNIVERSITE de ROUEN;
  - CRPMEM Nord – Pas de Calais - Picardie
  
- ◆ CHANGEMAN budget (2011 – 2014)
  - Overall budget: ~3.5 million €
  - Funding applied for: 1 million €
  - Overall effort: 337 months, of which:
    - 185 months of permanent staff (no funding applicable)
    - 152 months of PhD & PostDoc (funding applicable)

# CHANGEMAN objectives

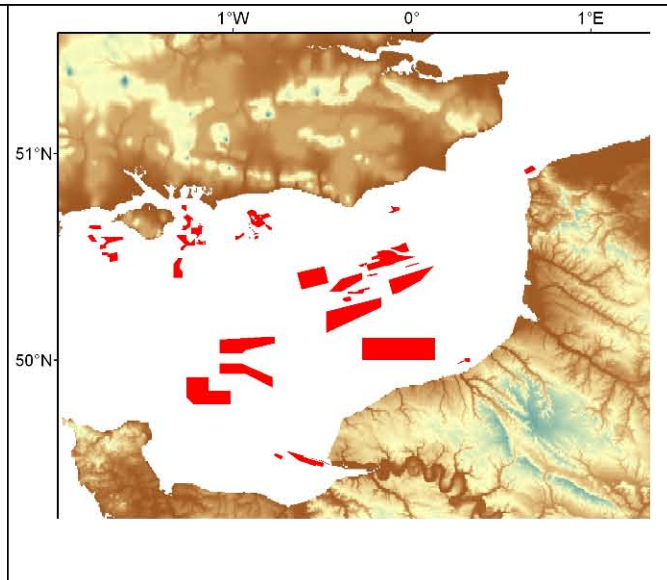
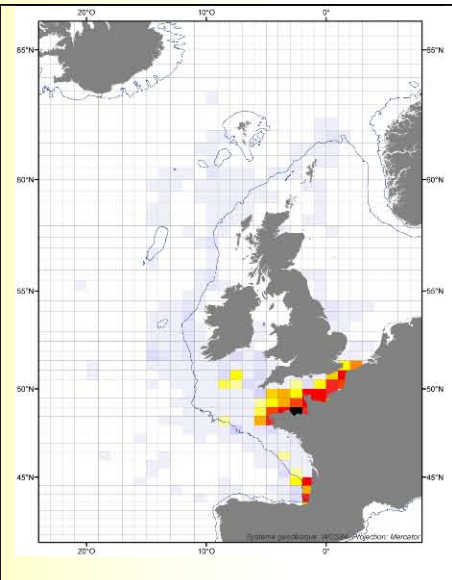
- ◆ To combine and progress understanding of the different current and potential human pressures operating on the Channel maritime domain (Task 1);
- ◆ To better understand the mechanisms of changes in marine life, fishing activities, and the role of human activity in these changes (Tasks 2, 3 and 4);
- ◆ To project the future changes and ecosystem consequences of implementing the EBM to the Channel maritime domain, considering a variety of future possible scenarios of adaptation and mitigation (Task 5);
- ◆ To synthesise the derived information into comprehensive assessments and recommendations for different policy makers and other stakeholders (Tasks 6 and 7).

# CHANGEMAN drivers investigated

## Fishing

## Gravel extractions

## Maritime traffic



# CHANGEMAN complements VECTORS

- ◆ **CHANGEMAN supplements VECTORS:**
  - VECTORS funding is relatively limited (43 months for IFREMER);
  - CHANGEMAN funds 100% PhD/PostDoc costs (99 months for IFREMER)
- ◆ **Common Tasks:**
  - Modeling of larvae trajectories;
  - Quantitative modeling of trophic interactions;
  - Quantitative modeling of fishing behaviour;
  - Development of cross-sectoral modeling platform;

- Channel long term scenarios (drivers & pressures);
- Physical impact of trawls & aggregate extractions (targeted experiments);
- Long-term impact of noise resulting from maritime traffic on fish distribution (targeted experiments);
- Qualitative approach of trophic interactions (and comparison with the outcomes of quantitative modeling);
- Coupling Ecosystem-Based Management model with spatial planning;

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- CHANGEMAN does not have a Task dedicated to economic valuation per se;
- Linkage with the CHARM3 project where economic expertise is applied to the Channel fisheries;
- 2 CHANGEMAN workshops have been planned to match the CHARM3 agenda
- CHARM3 economic evaluation will be integrated in the CHANGEMAN holistic modeling platform



# CHANGEMAN outline

