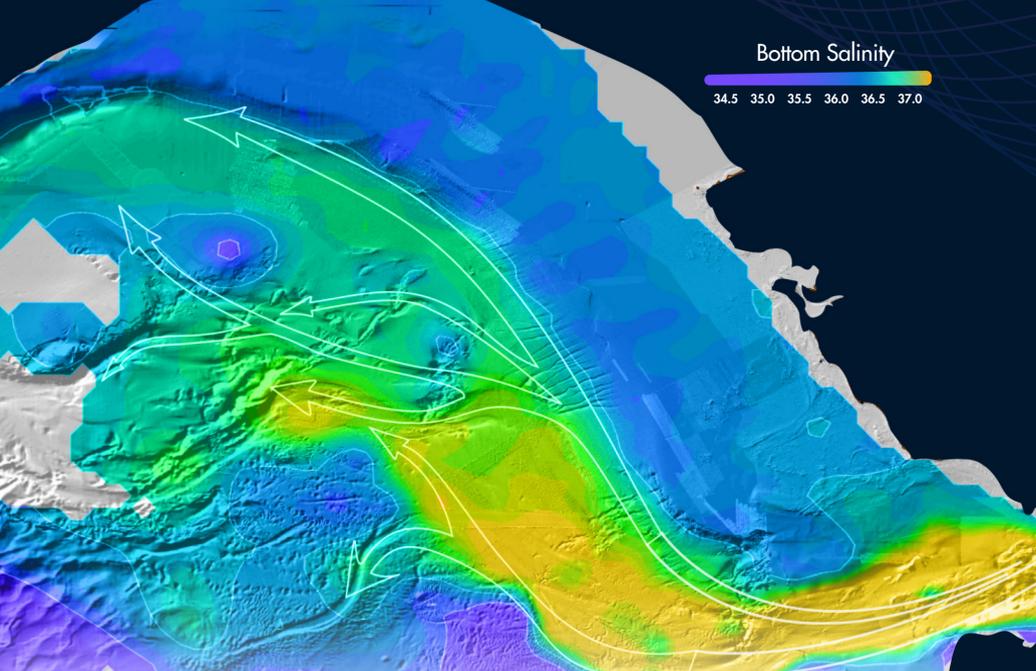




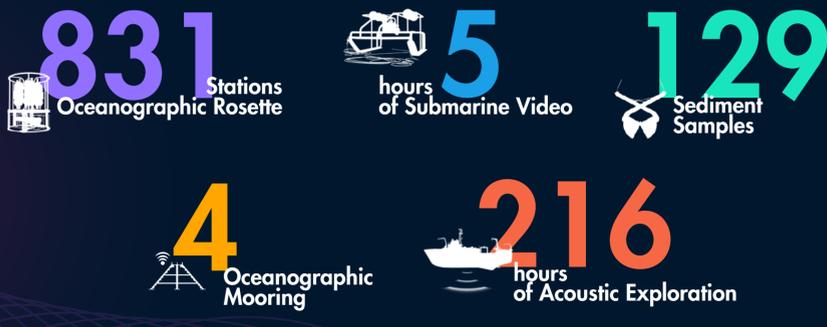
# PROJECT INPULSE

At present, the Straits of Gibraltar acts as a point of exchange between the Mediterranean and Atlantic water masses. The outgoing Mediterranean water flows below the incoming Atlantic due to its higher density, as a result of higher salinity water in the Mediterranean Sea. Here, the Mediterranean Outflow Water (MOW) is generated cascading into the Gulf of Cadiz before continuing on into a long journey across the Atlantic Ocean.



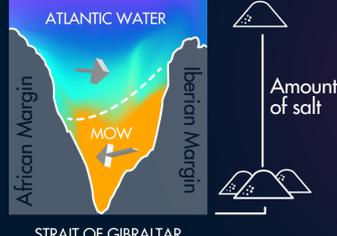
INPULSE is studying how MOW is affecting the seafloor, bedforms, type of substrate and associate habitats in the Gulf of Cadiz. Its results would contribute for a better sustainable management and resources exploitation in the area.

## How this study has been done?



# The MOW

The MOW (Mediterranean Outflow Water) represents the water mass outflowing from the Mediterranean toward the Atlantic as a bottom water mass due to its higher salinity.

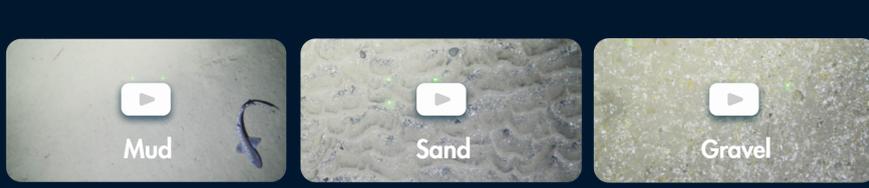


## IS THE SUBMARINE RELIEF AND SEA-FLOOR MODIFIED by the MOW?



Changes on strength and direction of the MOW influence on the sedimentary processes and seafloor relief evolution, even at short-term spatial and temporal scales.

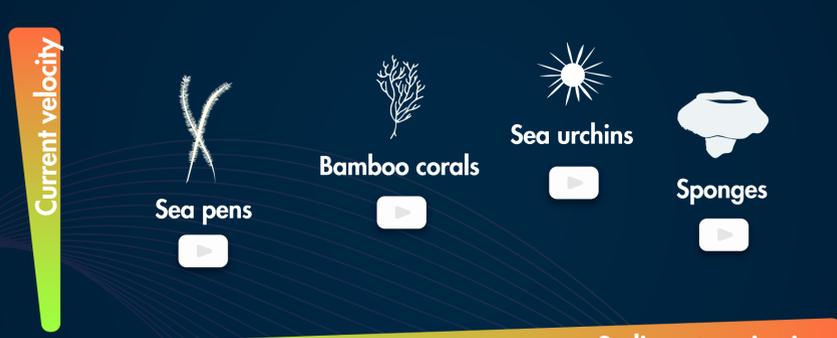
## IS THE SEDIMENT TYPE INFLUENCED by the MOW?



Current velocity

Sedimentary deposits on the seafloor (what type and how is deposited) are directly related to the current.

## ARE SEDIMENT-DWELLING SPECIES CONDITIONED by the MOW?



Both current velocity and type of substratum condition the occurrence of different habitats



INSTITUTO ESPAÑOL DE OCEANOGRAFIA

UniversidadeVigo



UCA Universidad de Cádiz

ICMAN Instituto de Ciencias Marinas de Andalucía



IACT Instituto Andaluz de Ciencias de la Tierra

