

## The VLIZ Research Framework

Vandegehuchte Michiel and Mees Jan

Flanders Marine Institute (VLIZ), InnovOcean site, Wandelaarkaai 7, 8400 Ostend, Belgium  
E-mail: [michiel.vandegehuchte@vliz.be](mailto:michiel.vandegehuchte@vliz.be)

Flanders Marine Institute (VLIZ) was established in 1999 and since then has a multidisciplinary character, supporting all marine research disciplines and some thousand marine scientists at universities and knowledge institutions in Flanders. To perform this task, VLIZ provides access to the research vessel Simon Stevin and other research equipment and infrastructure, develops data systems and data products and manages research data at the service of Marine Research Groups. The institute maintains a library as gateway for marine scientists and the wider public to various collections of physical documents and online information and creates policy relevant products and services, such as the Compendium for Coast and Sea. VLIZ is a strong advocate of Ocean Literacy and promotes Flemish marine scientific research through exhibitions, public meetings, publications, public presentations, websites, seminars, workshops and symposia.

These core activities of VLIZ continue today and will remain key activities in the future. Since 2017, VLIZ has also been mandated to initiate and perform research at the service of, in collaboration with or complementary to the Flemish and international Marine Research Groups. To this end, VLIZ has established a Research Division and developed a Research Framework. Through this Framework, VLIZ aims to strengthen the Flemish marine research community and contribute to VLIZ' mission: to promote the accumulation of marine knowledge and the excellence in marine research in Flanders.

The Research Framework describes the research themes VLIZ wants to actively pursue. The implementation of the research activities will be detailed in yearly work plans. Research by VLIZ aims to create an added value in the Belgian marine research landscape through multidisciplinary research activities. Throughout all research activities, options for the valorisation of data and infrastructure will be evaluated and applied

In the implementation of this Research Framework, there will be three possible roles for VLIZ, depending on the type of research activity: data or infrastructure driven research activities, research activities outside the active field of Flemish Marine Research Groups, or detected research needs in the field of currently active Marine Research Groups.

Research at VLIZ is structured in six large research themes, most of which are sub-divided in sub-themes. All themes allow for a multidisciplinary approach to fundamental as well as applied research:

- Ocean Services in a Changing Ocean
- Ocean Past
- Ocean Observation
- The Ocean and Human Health
- Policy driven and Responsive Mode Research
- Blue Sky Research

Four Multidisciplinary Centres of Excellence (Marine Data Centre, Marine Robotics Centre, Marine Imaging & Visualisation Centre and Multi-Environment Marine Experiment Centre) and enabling platforms, supported by the three research ESFRI infrastructures VLIZ takes part in (EMBRC, ICOS and LifeWatch) will support research at VLIZ as well as in Flemish Marine Research Groups.