

The decreasing cost-effectiveness of land transport in the European Union makes us looking for new ways of transport goods and people over long distances. My research has shown that the current ferry routes on European seas avoid smaller ports located along their routes. The research is concerned on more efficient exploitation of waterway transport routes to optimize the development of regional communication, while maintaining sustainability.

The idea is to transform existing shipping lanes, to develop regional tourist and commercial communications, on the examples of the Baltic and Mediterranean sea basins.

The proposed solution is an autonomous transport ferry (about 200 m). Used as a hub for smaller passenger ships (about 15 meters). These smaller ships will bring passengers to regional ports located along large ferry routes. Thanks to this system, passenger ships take over only the minimum distance between shipping routes and smaller ports, therefore the energy used to overcome long distances, between one port and the other, is significantly reduced. The solution is visualized on three (3) included infographics, that are based on two different examples of geographic location of existing ferry routes.

As a result, the solution will lead to the development of tourist communications, in coastal regions, on the shipping route of large ferries. It also enables the realization of the manufacturing system of small coastal trade.