Influence of a Sea Structure on the Surrounding Wind Field.

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Summary. — We have experimentally studied the kinematic influence of an oceanographic tower on the surrounding wind field. The tower is located in the open sea in the northern Adriatic. The paper describes the tests carried out in a wind tunnel and their results.

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1. — Introduction.

Our aim is the description of the tests carried out to estimate the kinematic influence of an oceanographic tower on the surrounding wind field. The tower is run by the Istituto Studio Dinamica Grandi Masce in Venice, and it is used both for routine wind data collection as for occasional specific measurement programs. Before analysing the available data it seemed useful to estimate the influence of the structure on the measurements. Consequently we built a small-scale model of the tower and studied its influence in a wind tunnel.

Section 2 of the note describes the tower and the locations chosen for the test. Section 3 briefly describes the technical details of the tests. The results are reported in sect. 4.
Fig. 1. -- The oceanographic tower of CNR. The location in the northern Adriatic Sea is shown in the upper left-hand corner.