

The odour is an environmental feature that deeply affects both the environmental and the life quality. The odour recognition as environmental variable has led to the increasing interest of the community against odour emissions produced by some industrial activities. In this sense today the term "olfactive pollution" is used to describe the negative impact of odorous substances on the environment and on the population exposed. Although bad odours do not generally represent a risk for human health because they are linked to a sensorial perception rather than to an immediate danger, they constitute a factor that could cause both physiological symptoms (respiratory problems, nausea, headache) and psychological stress for those exposed. For this reason the problem of odour emissions caused by industrial plants and farms cannot be more undervalued as it more often leads to citizens' complaints. The project **ODORTEL®** arises from the need of public authorities to monitor odour emissions in order to manage the complaints of the citizens living nearby odour sources.

Classic Approach: paper questionnaires

A common approach adopted by public authorities is the monitoring of odour nuisances by the use of paper questionnaires filled out by active citizens.

THIS APPROACH HAS LIMITS INCLUDING:

- information not in real time;
- mistakes during the compilation;
- data should be transcribed to perform statistical analysis;
- reliability of the reports;
- tired population.

Innovative Approach:

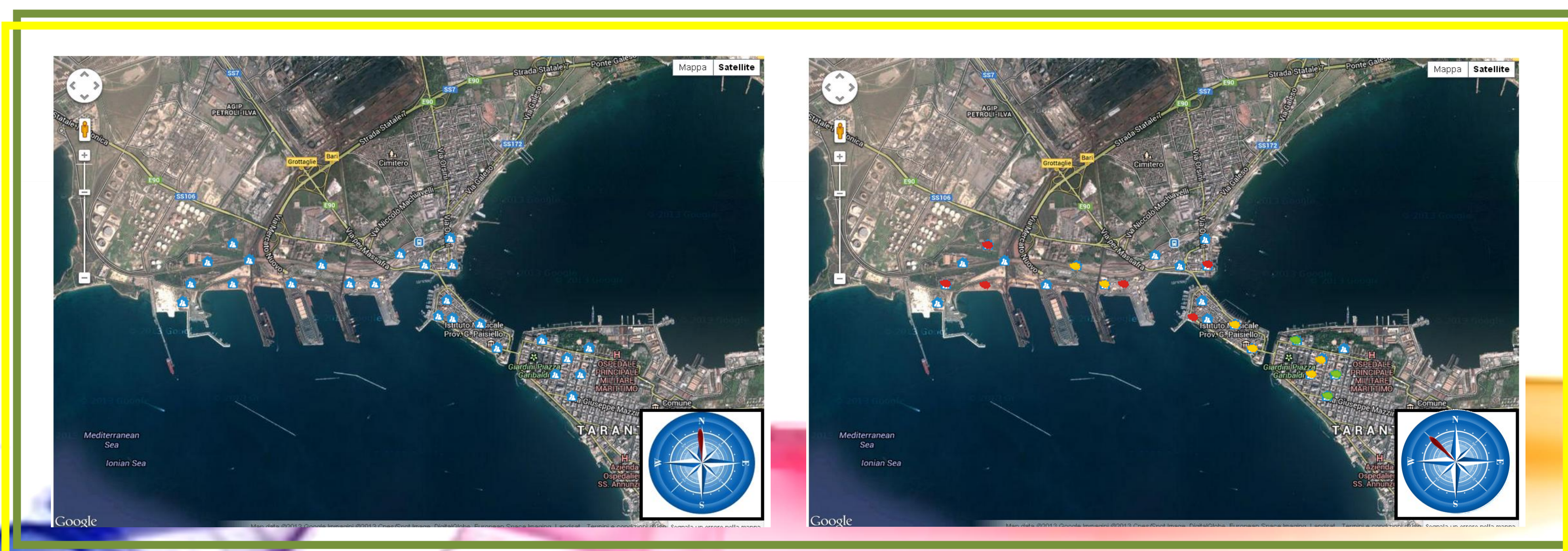
ODORTEL® is a digitalized system for the management of the olfactory nuisance in the surrounding of osmogenic sites. It uses an automated communication system through which a panel of residents available can communicate their perception of olfactive discomfort simply by contacting a telephone system and thus activating monitoring systems in real time.

These calls are registered in a database and create a real-time odour map which time after time is updated thanks to the calls of the users themselves. The graphical interface through a website allows to query the database and to obtain information about date, time and number of reports both synoptically both on the map.

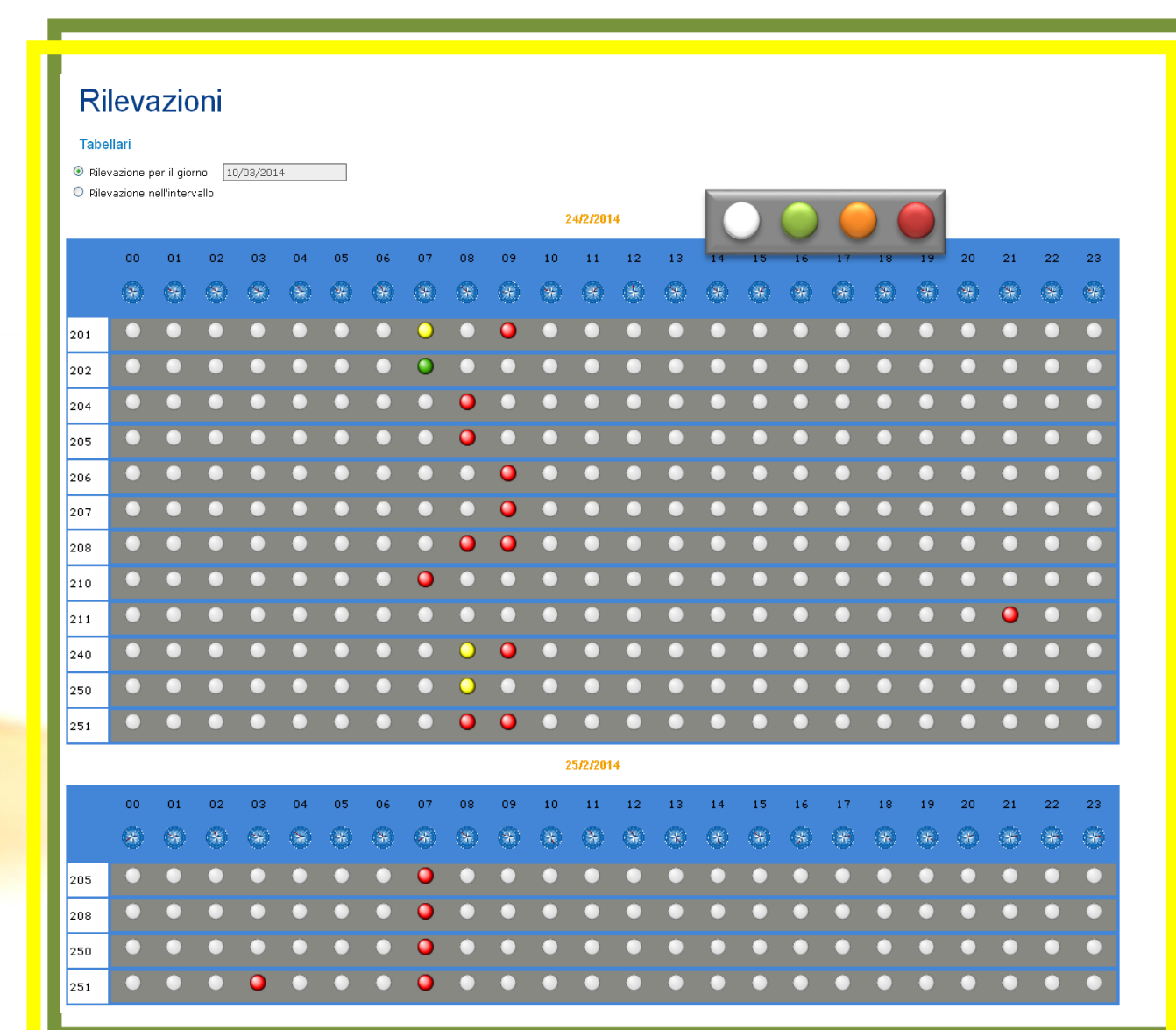
ODORTEL® is part of a larger project (CONTROLODOR®) which aims at the monitoring of odours and at the development of a decision support system for public authorities and for industrial plants at osmogenic risk.

OdorGel

Visualization of the calls on the map



Synoptic Visualization



ODORTEL® APPEARS TO BE THE RIGHT SOLUTION TO DIFFERENT NEEDS, ENABLING :

- CITIZENS TO EXPRESS THEIR DISCOMFORT IN A SIMPLE AND IMMEDIATE WAY.
- PUBLIC AUTHORITIES TO HAVE DIGITALIZED REPORTS OF TELEPHONE COMPLAINTS
- INDUSTRIAL PLANTS TO HAVE A USEFUL TOOL FOR THE STUDY OF EMISSIVE SCENARIOS IN ORDER TO IMPLEMENT QUICKLY MITIGATION MEASURES.