LSI LASTEM — *Environmental Monitoring Solutions*

Gidas-ADM
Software for odor dispersion calculation (BSZ422)

Calculation and visualization of odor concentration over a specific area. This parameter can be expressed as odor units or as a percentage compared to the maximum value recorded.
Gidas-ADM uses a simplified version of the Gaussian model WinDimula, which is developed by ENEA (National Agency for New Technologies, Energy and Sustainable Economic Development) and Maind Srl and recommended by ARPA Agency.

- ● Calculation of the odor concentrations dispersion
- ● Source and emission configuration
- ● Real-time results on map
- ● Calculation and visualization of the atmospheric stability class
- ● Report creation

Main features
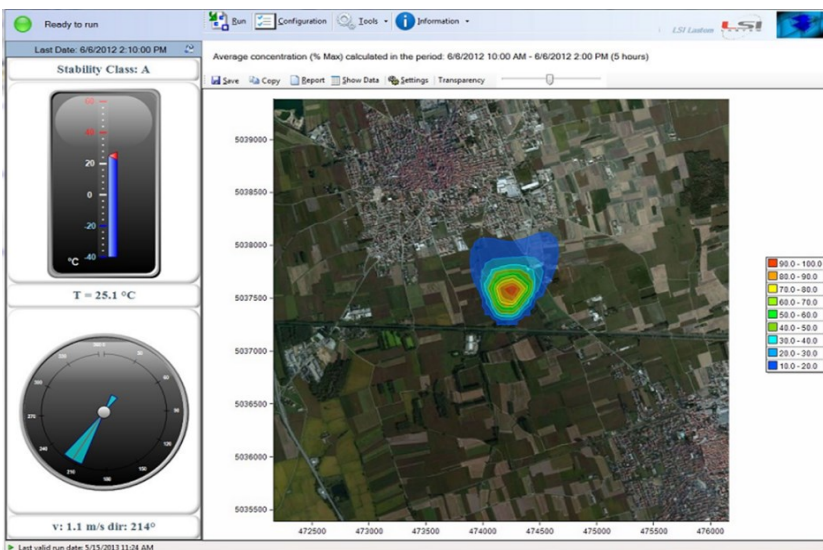
● *Visualization module:*

- *Visualization of the result in the form of odor concentration isolines (% with respect to a set maximum value)*
- *Atmosphere stability class*
- *Wind direction and speed*

The results are updated in real-time if the program is left running and with online data logger.

Configuration of parameters

- Use of meteorological data saved in the GIDAS database
- Quantities required for the calculation: temperature, wind speed, wind direction, standard deviation of direction or net and global radiation
- Configuration of the source and the predictable emission
- Selection of the period to be considered or real-time mode
- Configuration of the map used as background of the visualization

Results

- Graphic display of results on a map and numeric display on a tabular report.
- Automatic calculation of concentration on an hourly basis and calculation of mean value over the selected period.
- Calculation of odor concentration expressed as odor units, which are configured according to the peak to mean ratio, or expressed as a percentage compared to the maximum value recorded in the specific area
- Calculation and visualization of the atmospheric stability class (Pasquill). Using Wind Direction Standard Deviation or Global and Net radiations
- View of real-time temperature, wind speed and wind direction
- Extraction function of the map with the obtained results
- Report in HTML format with customizable logo