

**Post-doctoral position available at the University Littoral Cote d'Opale (France)  
in atmospheric turbulence and boundary layer dynamics – 12-month contract**

**Assessment of the atmospheric turbulence and boundary layer dynamics and their influence on the  
energy production by wind turbines**

Supervisors: Pr Alexei Sentchev, Dr Patrick Augustin, Pr François G. Schmitt

Candidate Profile:

PhD degree (or equivalent) in the field of geophysical fluid dynamics (atmosphere or ocean), turbulence, signal processing.

Specific skill: Fluid mechanics and turbulence, atmospheric physics, measurement techniques, signal processing and data analysis, good level of oral and written communication, ability to work in an interdisciplinary team and to take responsibility.

Practical Information:

The position is located at the U. Littoral Cote d'Opale, Lab. Oceanography and Geosciences, Wimereux (UMR 8187 - LOG, 32 Avenue Foch, 62930 Wimereux) <http://log.cnrs.fr>

Period and starting date: 12 months period from January 2019.

Application procedure:

Please send motivation letter, CV including list of publications and academic references to:

[Alexei.sentchev@univ-littoral.fr](mailto:Alexei.sentchev@univ-littoral.fr)

[Patrick.augustin@univ-littoral.fr](mailto:Patrick.augustin@univ-littoral.fr)

[Francois.schmitt@log.cnrs.fr](mailto:Francois.schmitt@log.cnrs.fr)

Salary: Pay scale is about 2200 euros/month net income (French "CDD")

Final date for applications: October 15, 2018.

Job description:

The research will be performed in the framework of the experimental project EMPATIE involving two academic labs: Oceanography & Geosciences (LOG) and Physics & Chemistry of the Atmosphere (LPCA) of the U. Littoral (ULCO). The project focuses on assessment of the atmospheric turbulence and boundary layer dynamics and their influence on the energy production by the wind turbines located at the sea front in Boulogne-sur-mer. EMPATIE is experimental project which provided a sizeable data base including: high-frequency continuous velocity measurements by sonic anemometer in a location near the wind turbines, atmospheric lidar measurements. The candidate will do data processing and analysis, estimation of the multiscale and intermittent turbulent properties for different wind regimes and will try to quantify the impact of turbulence, sea breeze and low-level jet on energy production.

Keywords: Atmospheric turbulence; Boundary layer dynamics; Wind energy conversion