Unai San Miguel Alzórriz

Curriculum Vitae



Personal information

Married, 3 daughters Born in 1974 in Spain

Education

1992-2000 Aeronautical Engineer, Universidad Politécnica de Madrid

Master thesis: Preliminary design of a wind turbine

Experience

2010-Present R & D Engineer, Nordex / ACCIONA Windpower, Navarra

In the Blades design area, developed tools to perform aerodynamic design and analysis of wind turbine blades.

Design of AW61.2, AW64.7, AW64.7_2 (with prebending) blades

2007–2010 R & D Engineer, ACCIONA Windpower, Navarra

In the Patents and research area, I took part in research projects, managed some patents and did technological surveillance.

• Researcher in project EOLIA: Deep water offshore wind technologies

2000–2007 R & D Engineer, Gamesa Eólica, Navarra

In the Aerodynamics, Loads and Siting area, I took part in projects with a broad scope: calculation and certification of design loads, measured loads analysis, aerodynamic design of blades, complex terrain wind flow assessment, product support from the overall performance of the wind turbine point of view.

1999–2000 **Internship**, *Gamesa Eólica*, Navarra In the Aerodynamics, Loads and Siting area.

Computer skills

Basic FLUENT, Stan (RStan)

Intermediate python, Matlab, R. I can use these to do pre- and post-processing tasks in data and

simulation analysis. I have written at least one package/toolbox of each to help me

and my colleagues in our daily tasks.

Intermediate LATEX, Microsoft Office, Bladed.

Publications

- 2017 Global sensitivity analysis of the blade geometry variables on the wind turbine performance., F. Echeverría, F. Mallor, U. San Miguel, Wind Energy, DOI: 10.1002/we.2111
- 2014 Airfoil family design for large offshore wind turbine blades., B. Méndez, X. Munduate, U. San Miguel, 5th Science of Making Torque from Wind Conference, Volume: 524, June 2014, DOI: 10.1088/1742-6596/524/1/012022
 - Evolutionary blade design tool for maximizing energy in a wind turbine., E. Echeverría, J. Sanz-Corretge, U. San Miguel, E. Llorente, EWEA 2014, Barcelona
- 2001 Flow over topographic configurations of interest: Comparison of results of different models., M. Esteban, A. Crespo, J. García, J. Hernández, U. San Miguel, EWEC 2001, Copenhagen

Communication Skills

2000–2005 Teacher in two sessions of the ETSII UPM course *Expert in design and planning of wind farms*.

Languages

Spanish Native

English Good

French Basic

Interests

- Wind turbines aeroelasticity, data science and statistics, bayesian reasoning, data visualization.
- Pastry cooking, hiking.