Martí Jiménez

Toulouse, France • linkedin.com/in/marti-jimenez • marti.jimenez.2002@gmail.com • +33 (0)6 95 13 53 47

Experience

Deep Learning Researcher in Oncology, University of Montpellier (internship)　　　3 months, 2023
Laboratory of Pathogen and Host Immunity (LPHI), Montpellier, France
- Developed a n-Dimensional non-linear Partial Differential Equations (PDEs) solver framework employing Physics-Informed Neural Networks (PINNs), resulting in an exponential reduction of time complexity compared to traditional methods.
- Successfully solved a complex 4D non-linear PDE system that captures the evolution of melanoma tumor heterogeneity, utilizing the finite difference method in Julia.
- Researched and proposed 2 methods to solve interdependent systems of non-linear PDEs with PINNs.

Projects

Music Genre Classification　　　1 month, 2023
　　　Predicting the genre of songs based on their lyrical content with Machine Learning.

Numerical Solutions for Poisson's Equation　　　1 month, 2023
　　　Numerical solver using Finite Difference Method for Poisson's Equation in 1D, 2D, and 3D.

AI Software for French pronunciation assistance　　　5 months, 2022
　　　Software that evaluates pronunciation of consonant pairs in spoken French.

Spanish Word Guessing Game　　　1 month, 2021
　　　Web game where players guess the word of the day by identifying similar-meaning words (Word2vec).

Education

INSA (National Institute of Applied Science) 4th Year　　　**Toulouse, France**
Master of Engineering, Computer Science　　　09/2020-Today

University of Twente, M1 Exchange Semester　　　**Enschede, Netherlands**
Machine Learning, Deep Learning, NLP, Information Retrieval, Big Data　　　09/2023-Today

Skills

Skills: Machine Learning, Applied Mathematics, Data Structures & Algorithms, Deep Learning, NLP
Programming Languages: Julia, Python, C, Java, Matlab, x86 Assembly
Languages: <u>Native languages</u>: French, Spanish, Catalan. <u>Advanced</u>: English-C1(TOEIC 965/990)

Activities & Portfolio

Activities: Pianist, Singer and guitarist in a Rock Band, Runner, Road Cyclist, Lacrosse player
Portfolio: https://marti2405.github.io/