Olivier Nguyen

NLP, Deep Learning, ML Engineering

olinguyen.com

nguyenolive@gmail.com github.com/olinguyen +1-xxx-xxxx

EXPERIENCE

Element Al Applied Research Scientist

September 2018 - Present

Montreal, Canada

- Led work on semantic search, information retrieval and question answering for Knowledge Scout, a product that helps businesses with knowledge management and discovery; turned proof-of-concepts into core functionalities of the product
- Built and deployed ML models for information extraction from 2D documents for Document Intelligence, a flagship product for automated document processing; actively involved from early research, to proof-of-concepts, MVP, and launch
- Developed and deployed text classification models to accelerate insurance clerks' workflows, reducing the time and number of errors during data entry
- Built deep learning models for table detection and entity extraction on bill of ladings and insurance forms; presented work and recommendations to partner clients

NTT Media Intelligence Lab Research Intern

January 2015 - August 2015

Yokosuka, Japan

- Built, trained and evaluated multi-modal models for a media event detection pipeline; submitted evaluation runs to TRECVID MED 2015
- Ran experiments combining objection detection, deep CNN features with traditional visual and audio features for the MED task submission

Thales / Concordia University Research Assistant

May 2014 - December 2014

Montreal, Canada

- Implemented signal processing algorithms on a TMS570 microcontroller in C for amplitude estimation of a sensor
- Optimized code to meet real-time requirements using fixed point representations

PROJECTS

GSoC 2017 Contributed to Shogun, an open-source ML library in C++. Blogged weekly

about a project for mortality prediction using the MIMIC-III dataset

PASS Developed an ML pipeline that filters and aggregates Twitter data to

provide population-level indicators of health for all regions in Canada

ConSat-3 1st Place at the Canadian Satellite Design Challenge; Developed and

integrated embedded Linux applications for a cube satellite

Jeux de Genie '15 1st Place against all engineering schools in Quebec; Developed the

software for a fully autonomous robot that had to complete multiple tasks

around a complex track

SKILLS

Programming languages

- Python
- C/C++
- Java
- · Javascript
- Bash
- SQL

ML frameworks & libraries

- PyTorch
- · HuggingFace stack
- TorchServe
- pandas
- scikit-learn
- NumPy
- spaCy
- TensorFlow
- MLFlow

Software development tools

- Docker
- git
- Flask/FastAPI
- PostgreSQL
- · Redis
- · Celery
- Kubernetes

EDUCATION

MASc Elec. & Comp. Engineering

2016 - 2018

University of Waterloo

Advisors: Mark Crowley, Joon Lee

BEng Computer Engineering

2012 - 2016

Concordia University