**Machine Learning Engineer job description**

**Job brief**

As a machine learning engineering, you will work on the ML models powering our AI platform in collaboration with the rest of the team. You will be involved in all stages of the software lifecycle: from design to deployment and monitoring.

Our platform allows users to train Deep Learning models to detect objects on geospatial imagery from very few annotations (low-shot learning). The goal of this is to enable users to build their own models that are customized to their needs, rather than having to rely on pre-built detection tools that may not be the best match for their application. There are a number of very interesting challenges around low-shot learning, transfer learning, meta-learning and so on. As a machine learning engineering intern, you will conduct experiments to explore various architecture / training strategy / pre and post-processing methods to improve the results that our users get.

**Responsibilities**

1. Mine massive amounts of data from social network and products to gain insights and identify patterns using machine learning techniques and complex network analysis methods.

2. Design and implement ML algorithms and models (especially deep learning models) through in-depth research and experiment with neural network models, parameter optimization, and optimization algorithms.

3. Work to accelerate the distributed implementation of existing algorithms and models and enrich the parallel algorithms library.

4. Conduct research to advance the state of the art in deep learning and provide technical solutions at scale for real world challenges in various scenarios.

5. Apply ML algorithms/models to support research on computer vision, natural language processing and recommender systems that power products.

**Requirements**

* A master’s degree in Computer Science, Computational Linguistics, Physics, Mathematics or related field.
* A PhD is preferred.
* A background in independent research.
* Some experience in experimental design.
* Experience building machine learning applications using numerical and/or text data.
* Solid understanding of machine learning and statistics fundamentals.
* Ability to transform “raw” data to conform to the assumptions of a machine learning algorithm.
* Strong proficiency in Python as well as the numerical libraries such as Scikit-Learn, Pandas, NumPy, and SciPy.
* Experience for at least 1 year
* Ability to effectively communicate complex ideas to other members of the team