
KARIM HELMY

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EDUCATION

CARNEGIE MELLON UNIVERSITY - 2015- 2019

BSc, Statistics and Machine Learning / 3.42 GPA / Dietrich College / Dean's List Fall 2018; Spring 2016, 2018, 2019

PROFESSIONAL EXPERIENCE

INDEPENDENT DATA SCIENTIST – 2022-PRESENT

Working on my own projects and helping friends and clients build theirs. Built trading infrastructure and a market analytics platform. Built a miner fingerprinting product and sold it to Coin Metrics.

RESEARCH – GALAXY DIGITAL – 2021-2022

First hire on a now-large research team. Wrote words, code, and loans, and designed directional and RV trades on mining stocks and dog coins.

COIN METRICS – 2020-2021

SENIOR R&D ANALYST - 2020-2021

R&D and account management for the leading crypto data provider.

DATA ANALYST - 2020

Programming in Kotlin, Python, R, and SQL, contributing to research newsletter and institutional sales, and spearheading mining data product development.

INDEPENDENT CONSULTANT – TIMELOCK, LLC – 2019-2020

Provided technical and research consulting in the cryptocurrency space, with a focus on data science and protocol analysis. Clients included Coin Metrics, The Block, and Reciprocal Ventures.

RESEARCH ASSISTANT – CARNEGIE MELLON UNIVERSITY – 2017-2019

Machine learning research assistant for the Carnegie Mellon Field Robotics Center's FarmView project. Worked on bandit learning methods for agricultural automation under the supervision of Dr. George Kantor.

SUMMER TECHNOLOGY ANALYST – TD SECURITIES – 2017, 2018

2018: Internship with e-FX team. Updated currency hedger and FX trading apps using Java and Angular.

2017: Implemented Java application for trade reconciliation with Regulatory Trading Operations team.

PROJECTS

Many - 2022-2023

Ask me!

OTC.mx - 2019

Trustless, peer-to-peer options trading for arbitrary ERC20 pairs. Live on Ethereum mainnet: app available at [OTC.mx](https://otc.mx).

ZDEX - 2018-2019

UniSwap-inspired AMM on Zilliqa supported by the Zilliqa Ecosystem Grant. Testnet app available at zdex.cc.

COURSES

10-701 – MACHINE LEARNING (PHD)

08-303 – CRYPTOCURRENCIES, BLOCKCHAINS, AND APPLICATIONS

36-462 – DATA MINING

11-411 – NATURAL LANGUAGE PROCESSING

CODE

GO, PYTHON SCIENTIFIC STACK, R + GGLOT2, KOTLIN, SQL (POSTGRESQL + TIMESCALEDDB), SOLIDITY

LANGUAGES

ENGLISH, FRENCH, SPANISH, ARABIC
