

Marco Radaelli

639 Library Place, Evanston, IL – 60201 • 847-644-3921 • MarcoRadaelli2021@u.northwestern.edu

EDUCATION

Northwestern University, Evanston, IL

Expected June 2021

Master of Science in **Computer Science** (Combined BS/MS 4 year-long Program)

Bachelor of Science in **Computer Engineering** and **Economics**

MS Cumulative GPA: **4.0/4.0** | BS Cumulative GPA: **3.7/4.0**

Relevant Courses: Machine Learning; Artificial Intelligence; Data Structures & Algorithms; Database Systems;
Interactive Information Visualization; Optimization Methods for Data Science; Advanced Econometrics.

Kellogg School of Management, Evanston, IL

Expected Apr 2021

Certificate Program for Undergraduates in **Managerial Analytics**

Humboldt-Universität zu Berlin, Berlin - Germany

June-Aug 2018

Berlin: Global City in the Center of Europe; **study abroad program**

Cumulative GPA: **4.0/4.0**

RELEVANT EXPERIENCE

Institute of Visual Computing, University of Applied Sciences Bonn-Rhein-Sieg, Sankt Augustin - Germany

June-Sept 2019

Research Intern: Cross-modal prediction of hyperspectral images in micro-spectroscopy

- Won \$3500 DAAD RISE grant to conduct ML & data analytics research; expected to lead to publication by end of 2019
- Enabled easier manipulation of hyperspectral images (3000+ layers) by performing state-of-the-art pre-processing techniques
- Implemented advanced ML algorithms in MATLAB, R, and Python to allow device-free generation of images with high spectral and spatial resolutions, and improve early classification of microscopic samples such as cancerous cells

Institute for Student Business Education (ISBE) Analytics Team, Northwestern University

Apr-June 2019

Data Analyst and Consultant: Evanston McGaw YMCA pricing and marketing strategy optimization

- Extracted relevant information for pricing optimization by manipulating (Excel, Python) complex data on YMCA's client profiles
- Reversed 4-year long trend of decreasing profits by developing and pitching series of data-based recommendations
- Boosted visibility and revenues (expected +\$120,000) by designing more effective website and marketing plan

Design Thinking and Communication I & II, Northwestern University

Sept-Dec 2017, Apr-June 2018

Project Manager: Spatially-aware interactive iOS app — Lincoln Park Zoo floor plan design

- Enabled 3 Shirley Ryan AbilityLab (CHI) patients to carry out unsupervised at-home rehabilitation for first time by providing interactive audio feedback through newly-designed iOS app "MyHomePT"
 - Increased accessibility of Park Place Café (Lincoln Park Zoo, CHI) by leading team of 4 in design, construction (FoamCore), and pitching of innovative floor plan "Park Plus"
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LEADERSHIP & ACTIVITIES

Institute of Electrical and Electronics Engineers (IEEE), Northwestern University

Dec 2018-present

Project Manager and Honor Society President: Occupancy sensing and prediction using PIR sensors and supervised ML algorithms

- Provided free-of-charge tutoring and academic guidance to 2 engineering students through Eta Kappa Nu honorary membership
- Devising privacy-respecting infrared-based detection system for real-time estimation of library occupancy density
- Leading team of 6 in design of ML algorithms in Python for time series analysis and forecasting of library occupancy density

Solar Car Team (NUsolar), Northwestern University

Sept 2017-June 2019

Software Lead and Electrical Team Engineer: Solar-powered vehicle design

- Designed, using AutoDesk EAGLE, new fully-analog circuit for light system of NU's 7th gen. solar-powered car for 2019 Formula Sun Grand Prix at Austin's Circuit of The Americas
- Helped team secure 7th place at Formula Sun Grand Prix by providing custom telemetry system and GUI built in Python, C++, and Scala to display and monitor real-time car data during race

Italian Association (ITA), Northwestern University

Mar 2018-present

President and Co-Founder

- Contributed to grow club to a total of 79 members in one year by managing social outreach and organization of all events
 - Enhanced knowledge and appreciation of Italian culture by offering monthly film screenings, language tables, and food excursions
 - Helped 3 students reach B1 proficiency through voluntary 1:1 weekly tutoring and homework support
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SKILLS

Data Analysis: Proficient in MS Office | Intermediate in Stata, SQL, Tableau

Programming: Proficient in Python, MATLAB, Java, C++, C, Assembly | Intermediate in R, JavaScript, C#

Languages: Proficient in Italian, English | Intermediate in German, French, Spanish

Test Scores: ACT: 35/36 | SAT Math 2: 800/800