Joel Malissa

Side Projects: https://pamvo.com
1840 1/2 Lamont St NW • Washington, DC 20010 • (267) 312-0683 • joelmalissa@alumni.upenn.edu

CLEARANCE

Secret Clearance, Active 2022 – Present

EDUCATION

University of Pennsylvania – School of Engineering and Applied Science, Philadelphia, PA
Master of Science in Engineering | Mech. Eng. | GPA 3.60/4.00 May 2018
Bachelor of Science in Engineering | Physics & Mech. Eng. | GPA 3.13/4.00 August 2015

Pennsbury High School – Fairless Hills, PA
Class rank: 1/833

TECHNICAL SKILLS

Programming Languages: Python/PySpark, SQL, MATLAB
Software: Palantir Foundry (Workshop, Pipeline Builder, Ontology Management App/OMA, Carbon, and Code Repositories), Power BI, AWS (Lambda, S3, and CloudFront), Mathematica

CERTIFICATIONS

Palantir Foundry Application Developer June 2023
Palantir Foundry Data Engineer June 2023
Palantir Foundry Foundations May 2023
Microsoft Certified: Power BI Data Analyst Associate April 2022
Microsoft Certified: Power Platform App Maker Associate December 2023
Microsoft Certified: Power Automate RPA Developer Associate October 2022

PROFESSIONAL EXPERIENCE

Deloitte, Arlington, VA March 2025 – Present
Senior Consultant

Guidehouse, Arlington, VA November 2022 – March 2025
Senior Consultant

- Created data pipelines and dashboards in Vantage, Palantir's Army platform
- Built 28 (of the team's 42) dashboards for a Vantage project with approximately 2,000 average monthly users as of March 2025
- Learned Department of Defense data systems to collaboratively design client tools
- Automated data reports to enable faster and more reliable data-driven decisions
- Contributed solutions to Palantir's Developer Community: https://community.palantir.com/u/dev/summary (requires making an account)

NASA Goddard Space Center, Greenbelt, MD June 2020 – November 2022
Aerospace Engineer

- Extracted database of approximately 100,000 internally warehoused items via Python web requests to create a search tool
- In Python, programmed testing of a voice coil mirror for a lunar lidar prototype
- Led tens of vibration tests (random, sine, shock/burst, and notched) for flight and non-flight space hardware

NASA Kennedy Space Center, Cape Canaveral, FL May 2016 – June 2020
Mechanical Engineer

- Built https://nasaacronyms.com, which has over seven hundred weekly active users and uses Python and Power Query to automatically update the database daily
- Taught myself Ladder Logic and reprogrammed a thermoforming machine's PLC
- Integrated temperature control into a 10^{-5} torr vacuum chamber and ran thermal vacuum testing for an ISS flight experiment from -40 °C to +60 °C

- Managed development of a 5 kV electrosprayer for microgravity aeroponics

SpaceX, Hawthorne, CA January 2017 – April 2017
Build Reliability Intern

- Automated sensor drift verification for the pressure transducer production team
- Wrote the majority of my team's SQL queries and additional ones for another team
- Processed risk data by writing Python scripts and Excel macros

AWARDS

COMSOL Conference – Received best paper award 2019
PennApps Hackathon – Received a smartwatch for making an app that had 2,000+ users 2015
American MENSA Annual Gathering Sudoku Tournament – First place 2013
Exceptional Talent Award – Awarded by the Johns Hopkins University Center for Talented Youth for scoring 700-800 on the SAT I - Mathematics test before the age of 13 2005

SELECTED PUBLICATIONS

Johansen, et al. (2019). *Electrodynamic Dust Shield Testing on the Materials on International Space Station Experiment 11.* International Astronautics Congress (IAC), Washington D.C.

Wang, J., Malissa, J., Phillips III, J., Johansen, M., & Calle, C. (2019). *Numerical Model of Mars Electrostatic Precipitator*. COMSOL Conference, Boston. *Best Paper Award

Malissa, J., & Ahmad, N. (2019). *Bowles-Tatnall Wake Vortex Encounter Hazard Metric* [TM-2019-220285]. NASA Langley Research Center.

READING LIST

My reading list is available at https://joelmalissa.com/books