

# Jean Nassar

*Python & Robotics Expert*  
with 10+ years of experience

+32 499 41 28 47

✉ [jean@jnassar.com](mailto:jean@jnassar.com)

🌐 [jnassar.com](http://jnassar.com)

🔗 [masasin](#)

in [masasin](#)

34M, Canadian

Master of Engineering



**Summary** I'm a senior engineer with 10+ years of multidisciplinary experience. I focus on software development and hardware interfacing, but I am also strong in mechanical design, data science, and backend web dev.

## Work experience

Sep 2023– Jun 2025 **Software Developer, Nipro Digital Technologies Europe, Brugge, Belgium**

- Designed and developed new features and fixed bugs in the NephroFlow dialysis management application using Ruby on Rails and PostgreSQL
- Implemented functionality across various modules, including regulatory reporting, dialysis prescription management, authentication, user and patient management, support for configurable units, and more
- Collaborated with the team to triage and resolve bugs, tackle technical debt, and actively participate in the release process, including testing, documentation, and monitoring

Jan 2021– Aug 2023 **Senior Software Developer, Adimian, Brussels, Belgium**

- Took end-to-end project responsibility, including initial design, development, deployment, and maintenance
- Developed and maintained a variety of Python applications, including a web-based data management system and a data processing pipeline
- Utilized Python libraries like Pydantic, FastAPI, SQLAlchemy, and Redis for backend development and Vue for frontend tasks
- Efficiently addressed bug reports and managed releases, maintaining high-standard deliverables
- Leveraged tutoring experience to mentor colleagues, helping them improve their skills and on-board new team members, to high praise

Dec 2019– Aug 2020 **Senior Python Developer, Yields.io, Brussels, Belgium**

- Served as the primary Python developer, working on the platform core
- Refactored and stabilized the codebase, added tests, fixed bugs, and developed new features
- Worked on automatically migrating and testing client code and artifacts with version increases, and deprecated old features
- Moved integration tests away from depending on mocks into tests that worked with a deployed Docker environment

Mar–Oct 2019 **Industrial Automation Engineer, Kapernikov, Brussels, Belgium**

- Developed a conveyor belt monitoring system using Python 3 and ROS
- Used a laser profiler and camera for object identification and created a 3D representation of the conveyor belt
- Detected potentially disruptive objects in real time and produced visualizations for the client's video management system
- Fixed C++ bugs and created a standalone ROS node for the camera

updated 2025-07-01

- Feb–Dec 2018 **Data Scientist/Python Developer**, *Sentiance*, Antwerp, Belgium
- Moved the company's codebase from Python 2 to Python 3
  - Refactored core functionality into more modular components
  - Verified and built machine learning models in numpy and scikit-learn
  - Used pyspark to parallelize code execution, or to add new functionality
  - Worked on standardizing DevPI index contents using Pipenv

## Projects

- SPIRIT** Masters thesis project: third-person view for a monocular UAV
- Created a system that superimposed a CGI version of a drone on top of an actual image taken by its FPV camera earlier
  - Designed, conducted, and analyzed user studies which showed a large improvement in many metrics, even with 2 Hz transmission
- Yozakura** Software development lead for a teleoperated rescue robot
- Developed client-server system for robot control: programmed Raspberry Pi and mbed chips, including servo and sensor drivers
- Open Source Projects** Two packages on PyPI, many repositories on github, and contributions to other projects such as numpy, ROS, and more
- latexipy (129 stars) for exporting Matplotlib-based plots into native  $\LaTeX$ , this résumé (118 stars), AoC 2021 and 2022, and more

## Education

- 2014–2017 **MEng, Mechanical Engineering**, *Kyoto University*, Mechatronics Laboratory, Kyoto, Japan
- Thesis: A UAV Teleoperation System Using Subimposed Past Images
  - Tutored Python and software development best practices
- 2008–2013 **BASc, Honours Mechatronics Engineering**, *University of Waterloo*, Waterloo, ON, Canada
- Completed six co-op internships in three countries
  - Cofounded the Engineering Ambassador program
  - Directed the UW EngSoc Mental Health Awareness directorship

## Technical skills

- Languages** Python (incl. scientific; pytest), Ruby (incl. Rails), Javascript, C++
- Packages** Jupyter, FastAPI, Pydantic, Vue, SQLAlchemy, PostgreSQL, Redis
- Dev tools** Git, Docker, CI/CD, documentation (Sphinx, mkdocs), LLMs
- Robotics** ROS stack, RPi, ESP8266, Arduino, mbed, MicroPython
- Electromech.** Solidworks, Inventor, OpenSCAD, machining, PCB design, soldering
- Miscellaneous** Gimp, Inkscape; Linux, macOS X, Windows; Office suites

## Languages

- Native** English, French, Lebanese
- Fluent** Japanese, Arabic
- Intermediate** Dutch, Spanish