# Abdalla Rashed

Computer Vision Engineer

**Python Developer** specializing in **Machine Learning** & **Computer Vision** applications, with a background in Electrical Engineering. I possess high analytical and programming skills and seek to grow my experience in Al research & development.

## **Experience**

SEP 2022

MAR 2021

APR 2023 Project Engineer

Esterline Project Management Services, Lockheed Martin CISS (Contractor)

 Research & Development for an automated Foreign Object Debris (FOD) detection system for aircraft engine bays.

• Workshops & mentorship support.

Technology strategy consulting.

JUN 2022 Artificial Intelligence Intern

#### Lockheed Martin CISS

- Research & Development for an Al aircraft inspection program.
- Showcasing project progress, results, and future strategies to executives & VIP guests.

AUG 2020 Electrical Engineering Intern

### Abu Dhabi University

- Research for social-distance monitoring, vehicles detection, lane detection & behavior cloning projects.
- Self-Driving Course Material: Preparing lab manuals and project kits

## Education

SEP 2020

JUN 2020

B.Sc. In Electrical Engineering

Abu Dhabi University

• Summa Cum Laude with 3.99/4.00 CGPA.

#### Personal Info

Sharjah, UAE

+971 52 124 0215

github.com/r-evaar

r-evaar.github.io/profile

Golden Visa

## Software and Programming

Python PyTorch, NumPy, Pandas, Flask, OpenCV, Tkinter, Selenium

MATLAB
Deep Learning &
Data Acquisition

Toolboxes, App
Designer

C++ STL Web HTML, CSS, Bootstrap

Version Control
Git, GitHub, &
GitLab

#### Skills

### **Applied ML Experience**

- Vision Transformers
- CNN Classification & Regression
- Object Detection
- Motion Detection & Tracking
- Anomaly Detection & Self-Supervised Learning
- · Continual Learning

#### Additional ML Knowledge

 RNNs, Transformers for NLP Tasks, Multimodal Learning / Alignment

Agile Software Development Life Cycle

#### 3D Design & Printing

Autodesk Inventor

#### **Embedded Systems** Programming

- Arduino & Raspberry Pi
- Nvidia Jetson SOM

**ROS** Basics

Electrical Circuits Design

**Professional Writing** & Presentation in LaTeX & MS Office

Other Projects		
APR 2021	AI-Powered Autonomous Robot for Pit and Flue Wall Health Condition Assessment	
OCT 2020	Emirates Global Aluminium	
	<ul> <li>Worked on building an AI-Powered drone for monitoring the operating conditions of aluminum anode baking furnace.</li> </ul>	
	<ul> <li>Developed a framework for pit detection, visualization, &amp; post-processing.</li> <li>Worked on an UWB indoor positioning system.</li> </ul>	
JUL 2020	Smart Shopping Cart for People of Determination	
	Abu Dhabi University	
SEP 2019	<ul> <li>Developed a smart shopping solution to assist wheelchair users.</li> <li>Design involved: robotic arm for griping items, automatic barcode detection and scanning system, cart items detection &amp; validation, and a shopping user interface.</li> </ul>	
MAR 2020	2020 Autonomous Robot for Temperature Abnormalities Detection	
	Emirates Global Aluminium	
OCT 2019	<ul> <li>Worked on an AI robot for detecting temperature abnormalities at aluminum smelters.</li> </ul>	
	<ul> <li>Developed an autonomous driving framework for the robot.</li> </ul>	
	<ul> <li>Provided and designed a solution for electromagnetic field interference, enabling the robot to properly operate at site.</li> </ul>	

Awards	
APR 2021	First Place in 3 <sup>rd</sup> EGA Industrial Robotics Competition
	Emirates Global Aluminium
JUN 2020	First Place in 3 <sup>rd</sup> Annual ECE Design Project Competition - Judges' Choice
	Abu Dhabi University
MAR 2020	First Place in 2 <sup>nd</sup> EGA Industrial Robotics Competition
	Emirates Global Aluminium
2017-2020	Certificate of Excellence, Certificate of Honor Student
	Abu Dhabi University

## Other Activities

Dubai Maker Fair Exhibition 26th-28th Feb 2019

ADDA - Hackathon 17th-19th Nov 2019

## Languages

Arabic, Native Speaker

English, Fluent