GÖKTUĞ ÖCAL

Personal Information

Date of Birth	May 15, 1997
Nationality	Turkish
Driving License	B (2015)

Education

2021 -
Istanbul

Bogazici University (MSc)
Computer Engineering

2015 - 2020
Istanbul

Istanbul Technical University (BSc)
Control and Automation Engineering
GPA: 2.89

2011-2015
Istanbul

Burak Bora High School

Experience

May 2022
Ford Otosan

Data Scientist
Analysing car and truck manifacturing data, optimizing driver performances. Defining Data Science protocols.

Oct 2019 - May 2022
Reengen Energy

Data Scientist
Analysing data with data science and machine learning methods, developing algorithms and designing data visualizations.

Jun 2019 - Oct 2019
Reengen Energy

Data Science Intern
Was responsible for data analysis and algorithm development.

Jul 2018 - Oct 2018
Honeywell A.Ş.

Intern
Was responsible for designing HMI control screen, organazing dot-list formats for set-up engineers.

Skills

- Python
- SQL
- C++
- MATLAB
- PowerBI
- Machine Learning
- Deep Learning
- Data Science
- Time Series Analysis
- Statistical Modeling
- Object Oriented Programming
- MS Office

Language Skills

English	Advanced Level (C1)
German	Beginner Level (A1)

Projects

Artificial Intelligence Based Time Series Forecasting

This is a senior design project for undergraduate program in ITU.

Used ARIMA and LSTM models for forecasting. Different datasets gathered in different domains and these models have been applied for forecasting task. LSTM variants have been studied and their performances have been measured. Python (tensorflow, scikit-learn) and Matlab have been used for this project.

Fault Diagnosis with Deep Learning

TUBITAK 1501 - Industrial R&D Projects Grant Programme : Integrated Industrial Internet Based Predictive Maintenance Platform. Cloud and End Device Analysis for Electric Motors in Industrial Plants.

Was responsible for analysis various electric motor signals from sensors to detect faults. Established a CNN model to classify signals by using MATLAB and Python for analysis.

Customer Segmentation by Energy Consumption Performances

Customers were clustered by their consumption performances extracted from energy data. The clustering process was developed with an unsupervised ML algorithm, K-Means clustering. Python with scikit-learn is used for the project and presentations were made with PowerBI.

Dynamic Anomaly Detection with Statistics

Anomaly detection was made with a statistical method, moving z-score in an IoT based web platform. Multiple window-based statistical methods and parameters were used such as z-score for anomalies, skewness and kurtosis for adjusting distributions.

Certificates

Jun 2022	**Big Data with PySpark** DataCamp
Jan 2022	**SQL Fundamentals** DataCamp
Dec 2020	**Machine Learning** Online Course by Stanford Online
Aug 2021	**IELTS** 7.0 / 9.0

Activities

2018-2019	As a volunteer, was giving Object Oriented Programming course in OTOKON. As a volunteer, working at ITU Artificial Ingelligence and Intelligent Systems Laboratory.
2017-2018	Was chairman of ITU Control and Automation Club (OTOKON).
2016-2017	Was general coordinator of an organization ITU Robot Olympics which is organized by OTOKON