KONSTANTINOS GEORGIOU

Knoxville, TN, US

+1 (865) 978-9244 | georgiou.kostas94@gmail.com

gkos.tech | www.linkedin.com/in/konstantinos-georgiou | https://github.com/drkostas

INTRODUCTORY PROFILE

Third-year PhD student in Data Science and Engineering at the University of Tennessee, with a focus on computer vision and machine learning. As a Graduate Research Assistant, I am conducting leading-edge research on transient earth data as part of a project sponsored by IARPA SMART. I have also published a paper on contrastive learning at IEEE WACV 2023 and demonstrated state-of-the-art results in the IEEE DFC2022 competition. In addition to my research experience, I have 2 years of professional experience as a software and data engineer.

CORE COMPETENCIES AND TECHNOLOGIES

Languages:	Python, Bash, NodeJS, Java
Frameworks/Tools:	Pytorch, Tensorflow, Apache Spark, Kafka, Django, Docker, Hadoop
Databases:	MySQL, MongoDB, PostgreSQL/Vertica, HBase
Services:	AWS, GCP, Jenkins, Travis/Circle CI
Skills:	Research, Computer Vision, Community Detection, Software Design

PROFESSIONAL EXPERIENCE

University of Tennessee – US   Jan 2021 – Now
Graduate Research Assistant

Researching cutting-edge computer vision topics at the AICIP Lab of Dr. Hairong Qi; established a strong research mentality while working alongside brilliant people with invaluable insights into the field. Second author paper on IEEE WACV 2023 about Contrastive Learning.

Key achievements
- Conducted leading-edge research on transient earth data as part of a project sponsored by IARPA SMART.
- Collaborated to develop a contrastive learning framework for pixel-level semantic segmentation on multi-band satellite images, leading to a second-author paper published in IEEE WACV 2023.
- Compiled a comprehensive review of the history and current state of object detection and tracking as part of my qualifying exam.

Performance Technologies S.A. – Greece   May 2019 – Dec 2020
Software/Big Data Engineer

Worked for 1.5 years as a Software and Big Data Engineer, cultivating soft skills while training and supervising small teams and handling communication and goal setting with demanding clients.

Key achievements
- Developed and maintained a large project for the biggest telecommunication provider in Greece, designed to replicate terabytes of data from hundreds of sources into a data lake with low latency and resiliency in mind.
- Coached the construction of a deep learning model that predicts the fulfillment time of orders using a highly dynamic dataset.
- Led the development, testing, and delivery of a large-scale service for benchmarking and crediting the SIP call quality of the Public Sector in Greece.
- Trained and supervised small teams and handled communication and goal-setting with demanding clients.

Global Voices Ltd – UK   Feb - Dec 2017
Software Engineer

Worked for 9 months (3 months as an intern - awarded the Erasmus+ Placement scholarship) as a Software Engineer and showcased my ability to adapt and learn in a dynamic environment which led to my first full-time job offer.

Key achievements
- Contributed to developing and maintaining the company's proprietary content management system, handling tasks such as bug fixing, feature development, and code reviews.
- Assisted with implementing and maintaining the company's continuous integration and deployment pipelines, improving the efficiency and reliability of product releases.
- Mentored junior team members and participated in code reviews to ensure high-quality standards.

EDUCATION

University of Tennessee – Knoxville, TN, US   Jan 2021 - Now
Ph.D. in Data Science and Engineering

- Attained a deep understanding of statistical modeling, Bayesian formulation, and hidden Markov models by completing challenging coursework.
- Designed bare-bone implementations of various classical and deep learning models, including CNNs and AEs, to gain strong intuition on the low-level technicalities of these models.
- Successfully coordinated multiple groups to complete a range of projects including transformer-based text generation and question answering, daily vaccination rate prediction, and reinforcement learning agents that play Minecraft, prioritizing efficient task allocation and high-quality delivery.

University of Patras – Greece   Sept 2012 - Feb 2019
Integrated Master's in Computer Engineering and Informatics

- Demonstrated proficiency in conducting research by devising an innovative approach for scaling a previously thought non-scalable community detection algorithm, published as the first author in a peer-reviewed journal.
- Excelled in academic projects and programming competitions, demonstrating skills in algorithm design, data structures, and classical machine learning.
- Completed highly demanding coursework in Numerical Analysis, Signal Processing, Operating Systems, Compilers, and Distributed Computing to cement strong computer science foundations.

CERTIFICATIONS

- Intel Edge AI Foundational Course Scholarship (Udacity)   2020
- GRE (Quant: 165, Verb: 151, W: 3.5)   2019
- Docker and Kubernetes: The Complete Guide (Udemy)   2019
- IELTS: 7.5   2018
- The Ultimate Hands-On Hadoop - Tame your Big Data! (Udemy)   2018
- Data Science, Deep Learning and Machine Learning with Python (Udemy)   2018
- MongoDB Essentials - Complete MongoDB Guide (Udemy)   2018
- Google Developer Challenge Scholarship: Android Basics (Udacity)   2017
- BerkeleyX: CS105x Introduction to Apache Spark (EdX)   2016