Nikos Pagonas

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Education

Columbia University   Sep 2024 – Present
PhD in Computer Science   New York, NY, US
Advisor: Prof. Kostis Kaffes
GPA: 3.94/4.00

Member of DAPLab, focusing on AI systems. Working on improving scheduling for agentic workflows, accelerating application-agnostic LLM serving, and providing efficient simulation support for agentic rollouts.

National Technical University of Athens (NTUA)   Oct 2018 – Jun 2024
Master of Electrical and Computer Engineering   Athens, Greece
Advisors: Prof. Nikos Vasilakis, Prof. Georgios Goumas
GPA: 9.39/10.00 (14th out of 344 students)

Thesis: *"SPLaSh: Scaling Out Shell Scripts on Serverless Platforms"*

Experience

Google   May 2025 – Aug 2025
Student Researcher   Sunnyvale, CA, US
Supervisor: Prof. Arvind Krishnamurthy

Designed and implemented Cortex, a prototype agentic serving platform that leverages workflow-awareness and stage isolation to improve scheduling and KV cache efficiency in agentic NL2SQL workflows.

Brown University   Sep 2023 – May 2024
Student Researcher   Providence, RI, US
Advisor: Prof. Nikos Vasilakis

Contributed to PaSh, an open-source Linux Foundation project. Worked on improving the performance of shell scripts by running them on serverless infrastructure, and providing fault tolerance for distributed shell script execution.

Arrikto Inc.   Dec 2022 – Mar 2023
Software Engineering Intern   Athens, Greece
Supervisor: Vangelis Koukis

Explored how to serve PyTorch models more efficiently through KServe, a highly scalable machine learning deployment platform for Kubernetes.

Awards	**A.G. Leventis Foundation Scholarship**	2025
	Gerondelis Foundation Scholarship	2025
	Columbia University Presidential Fellowship	2024

Publications

Cortex: Workflow-Aware Resource Pooling and Scheduling for Agentic Serving
Nikos Pagonas, Yeounoh Chung, Kostis Kaffes, Arvind Krishnamurthy
1st Workshop on Systems for Agentic AI (SAA 2025)

λeash: Scaling Out Shell Scripts with Resumable Cloud Computing
(Under Submission)

A System-Centric Approach is Necessary for AI Agents
(Under Submission)

Service

EuroSys 2026	2026
Artifact Evaluation Committee	
SOSP 2025	2025
Artifact Evaluation Committee	
OSDI 2025	2025
Artifact Evaluation Committee	
ATC 2025	2025
Artifact Evaluation Committee	
EuroSec 2024	2024
Web and Publication Chair	

Teaching

Columbia University	Fall 2025
Teaching Assistant	New York, NY, US
Course: Networks, Crowds, and the Web	
Professor: Augustin Chaintreau	
Columbia University	Spring 2025
Teaching Assistant	New York, NY, US
Course: Agentic Systems Made Real	
Professors: Eugene Wu, Kostis Kaffes	
Brown University	Fall 2024
Teaching Assistant	Providence, RI, US
Course: Systems Transforming Systems	
Professor: Nikos Vasilakis	

Guided students through a systems research project, including implementation, evaluation, and paper writing. Paper submitted to USENIX ATC 2025.

Brown University — Spring 2024
Teaching Assistant — Providence, RI, US
Course: Distributed Systems
Professor: Nikos Vasilakis

Helped revamp the course by redesigning its semester-long project and implementing its autograding infrastructure from scratch.

National Technical University of Athens — Spring 2022
Lab Assistant — Athens, Greece
Course: Operating Systems
Professors: N. Koziris, G. Goumas

National Technical University of Athens — Spring 2020
Lab Assistant — Athens, Greece
Course: Programming Techniques
Professors: N. Papaspyrou, A. Pagourtzis, G. Stamou, G. Goumas

National Technical University of Athens — Fall 2019
Lab Assistant — Athens, Greece
Course: Introduction to Programming
Professors: N. Papaspyrou, D. Fotakis, S. Zachos

Research Mentoring

Grace Li — Sep 2025 – Present
Columbia University, BS in CS and Math

Joey Huang — Sep 2025 – Present
Columbia University, BS in CS

Matthew Lou — Sep 2025 – Present
Columbia University, BS in CS and Applied Math

Skills

Prog. Languages	Python, C, Shell, Javascript, Java, Go
Frameworks	LangChain, LangGraph
Platforms	AWS, Docker, Kubernetes, Apache Kafka, Apache Spark
Tools	Git, LaTeX

Languages

English	Fluent — TOEFL iBT 116/120 (C2)
Greek	Native