

Anastassios Nanos

CHIEF SCIENTIST & CO-FOUNDER, NOFire AI · SYSTEMS RESEARCHER

Office 159 Fortuna House, 88 Queen Street, Sheffield S1 2FW, United Kingdom

☎ (+44) 7428318494 | ✉ info@ananos.co.uk | 🏠 ananos.co.uk | 📺 ananos | 🌐 ananos | 🐦 @anan0s

Research Interests

Hypervisor technologies, Systems Software, Unikernel Frameworks, Lightweight workload deployment, I/O Virtualization, Orchestration, Hardware Acceleration, System support for Machine Learning & Artificial Intelligence, Sandboxing and isolation of AI agent workloads.

Skills

Programming	C, python, bash, Go, Rust, C#
Linux Kernel Programming	Device Drivers (Block/Network), Virtual Memory Management, x86 and ARMv7/8, SoC bootstrap
Virtualization	Xen (extensive experience with MM, scheduling, device/drivers integration), KVM (MM, virtio), Apple Hypervisor.framework (hvi microVMM), QEMU, Firecracker, Cloud Hypervisor
Unikernels	rumpkernels, unikraft, LKL, OSv
Orchestration	Kubernetes, docker
Container Runtimes	urunc, runc, containerd, docker, kata-containers, custom
Edge/Embedded systems	NVIDIA Jetson variants, Google Coral, RPi, Exynos (5422, 7420), Zynq-7000/Ultrascale+, KU3, LanaiXP
Interconnects	Bluefield, 10GbE, Infiniband, Myrinet/GM & MX, Open-MX
DBMS	MySQL, PostgreSQL, MongoDB

Technical & Language Skills

Operating Systems	Linux, Unix, Free/Net/OpenBSD, MS Windows Extensive experience setting up various Data Center related services such as: DNS (bind), WWW (apache, nginx), Mail (sendmail & postfix, dovecot), DBMS (MySQL/Postgres, MongoDB), Auth and Directory services (openLDAP & Heimdal Kerberos), VoIP (Asterisk), Networking (CISCO IOS, iptables, openVPN), Monitoring (collectd, graphite, munin & mrtg). Familiar with the setup and deployment of Cloud Computing platforms (OpenStack), Orchestration Frameworks (K8s) & HPC schedulers (SLURM).
Systems Administration	
Typesetting	LaTeX, MS Word
Languages	English (Fluent), French (Moderate), Greek (Native)

Experience

NOFire AI

Remote

CHIEF SCIENTIST & CO-FOUNDER

Jun. 2026 - Present

- Leading technical strategy for runtime security and sandboxing in agentic AI systems. Architecting the platform's secure execution layer, with a focus on stateless, policy-attested runtimes for isolating AI agent workloads. Bridging open-source runtime infrastructure with enterprise-grade sandboxing to enforce strong isolation guarantees for untrusted code execution.
- Co-founded NOFire AI; raised a \$2.5M pre-seed round led by Marathon Venture Capital (May 2026).
- The runtime infrastructure is open source: <https://brig.sh>, <https://github.com/brig-sh/hull> and <https://github.com/brig-sh/hvi-vmm>.

NUBIS PC

Athens, GR

SYSTEMS ARCHITECT

Aug. 2020 - Present

- Nubis PC is a startup aiming to facilitate application deployment in cloud & edge environments

Nubificus Ltd

Athens, GR - Sheffield, UK

DIRECTOR & SYSTEMS ARCHITECT

Aug. 2018 - Present

- Nubificus Ltd is a software consultancy tackling complex virtualization problems. We explore lightweight virtualization solutions for edge, low power devices, aiming to bring Serverless and FaaS at the Edge.
- At Nubificus:
 - we enable hardware acceleration for Serverless Computing (<https://vaccel.org>).
 - we experiment with the systems software stack to reduce OS system overhead by enabling in-kernel task isolation using virtualization techniques (in-kernel VMM, <https://github.com/nubificus/hedge>).
 - we explore container runtimes to facilitate efficient workload placement in the Cloud and at the Edge, focusing on interoperability (<https://github.com/urunc-dev/urunc>).

Up2Metric S.A.

CLOUD CONSULTANT

Athens, GR

Sep. 2020 - Apr. 2022

- Container and Cloud consulting solutions for ML acceleration and orchestration.

Mellanox Technologies LTD

SOFTWARE - SYSTEMS ENGINEER

Athens, GR

May 2020 - July 2020

- Design and develop a TMfifo virtual device to passthrough a physical QRNG device to a Bluefield PCIe SmartNIC.

Sunlight.IO Limited

RESEARCHER - SYSTEMS ENGINEER

Cambridge, UK

Jul. 2018 - Apr. 2020

- Span out from the Emerging Technologies department of OnApp Limited
- Architected, implemented, and optimized a state-of-the-art hyperconverged hypervisor stack that achieves extreme storage and network performance.

OnApp Limited

RESEARCHER - SYSTEMS ENGINEER

Cambridge, UK

Feb. 2015 - Jun. 2018

- Conducted research in emerging, power-efficient micro-server architectures on scalable network and storage IO, and energy-driven resource management in cloud architectures.
- Additionally, I was involved in architecting and implementing low-level hypervisor and OS mechanisms in the context of EU-funded projects (EUROSERVER, SHARCS, ACTICLOUD, SUPERFLUIDITY, NGPaaS).

Up2Metric S.A.

SOFTWARE ENGINEER

Athens, GR - Sheffield, UK

May. 2016 - Sep. 2016

- Ported a computer vision algorithm to provide Augmented Reality annotation to staircases for Otolift core products.

Computing Systems Lab, NTUA

POST-DOCTORAL RESEARCH FELLOW

Athens, GR

Jan. 2014 - Jan. 2015

- Worked on IO Virtualization, systems software for high-performance I/O in virtualized environments, communication architectures for clusters, and scalable storage architectures based on clusters.

JUNIOR RESEARCHER

Apr. 2007 - Dec. 2013

- For the purpose of my PhD thesis, I worked on scalable block-level storage systems, communication architectures for clusters, custom 10gigE interconnection frameworks and I/O Virtualization.

SENIOR UNIX/LINUX ADMINISTRATOR

Apr. 2007 - Dec. 2013

- Maintained, administered and supported the lab (10-20 grad students, faculty members and visiting staff) providing services such as: DNS, WWW, Mail, VoIP and DBMS. From Sept 2011, my role was mostly advising the systems administration team.

Maxeler Technologies Ltd

London, UK

INTERN

Sep. 2011 - Mar. 2012

- Worked on porting the company's custom FPGA boards to virtualized environments. As my task was completed quickly, I joined the hardware group working on the company's new product line (MPCX), doing performance evaluation at first as well as kernel developing for the board's interface driver and the networking stack (Infiniband).

Mist.io Inc

COFOUNDER AND SYSTEMS ENGINEER

Athens, GR

Jan. 2012 - Jan. 2015

- Design, develop, deploy and maintain the company's product.
- Mist.io is about cloud server management, monitoring and automation across multiple cloud providers from any web device. Mostly develop in python, Javascript and bash.

Unweb.me Ltd

SYSTEMS ENGINEER

Athens, GR

Jan. 2011 - Dec. 2013

- Served as a systems engineer, deploying, administering and maintaining the company's infrastructure both on bare-metal servers (co-located) as well as cloud servers (mostly Amazon EC2).

Computer Center, ECE, NTUA

SENIOR UNIX/LINUX ADMINISTRATOR

Athens, GR

Oct. 2005 - Sep. 2010

- Setup the entire lab (25-30 workstations, 5 servers), migrated from Solaris-SunOS 4.3 to Debian GNU/Linux, and maintained the lab which featured a fully autonomous setup, able to provide the necessary software for students to work on ECE school's projects.

PC Systems S.A.

UNIX SUPPORT ENGINEER

Athens, GR

May 2004 - Sep. 2004

- Served as backend support for the company's clients mostly Solaris and some Linux-based setups.

Small accounting business

LINUX/WINDOWS ADMINISTRATOR

Athens, GR

Sep. 2001 - Sep. 2006

- Maintained all workstations (5) based on Windows 95/98/XP, migrated the server from Novel Netware to Windows server and finally Linux. Provided support for the integration of commercial software suites specific to the business (accounting) as well as general purpose software (network file sharing, scanning/printing etc.).

Freelance

WEB DEVELOPER

- Built small sites (static/dynamic) using HTML, PHP and mySQL.

Athens, GR
Sep. 2002 – Sep. 2005

Education

NTUA (National Technical University of Athens)

PH.D. IN COMPUTER ENGINEERING

- Thesis title: Efficient I/O Device Sharing in Virtualized Environments

Athens, GR
Dec. 2013

NTUA (National Technical University of Athens)

DIPLOMA IN ELECTRICAL AND COMPUTER ENGINEERING

- Thesis title: Design and implementation of a system transferring data from storage devices to Myrinet networks bypassing the memory hierarchy

Athens, GR
Sep. 2006

Publications

Security-aware service-chain orchestration across limited-trust, multi-tenant edge-cloud resource associations

G. KONTOS, P. SOUMPLIS, P. MAKRIS, A. KRETSIS, A. NANOS, E. VARVARIGOS

- DOI: <https://doi.org/10.1016/j.future.2026.108879>

Future Gener. Comput. Syst.

2027

vAccel-LO: Adaptive Hybrid Execution for Real-Time Edge-Assisted LiDAR Odometry

M. GKOUTHA, M. R. GKEKA, K. PAPAZAFEIROPOULOS, A. NANOS, N. KOZIRIS

Euro-Par 2026 Workshops

2026

vAccSQL: Efficient and Transparent AI Vision Offloading for Mobile Robots

A. ZAHIR, M. GUCCIARDO, F. SELKER, A. NANOS, K. PAPAZAFEIROPOULOS, C. J. BERNARDOS, N. WEBER, R. GONZALEZ

- arXiv: <https://arxiv.org/abs/2603.16685>

arXiv preprint

2026

Low-Latency ML Offloading Across Edge and IoT Devices

K. PAPAZAFEIROPOULOS, A. MALLIKOPOULOU, A. NANOS, G. GOUMAS, N. KOZIRIS

- DOI: <https://doi.org/10.1145/3777884.3796989>

ICPE 2026

2026

End-to-end latency assurance for distributed augmented reality over programmable 6G networks: A DESIRE6G demonstration

F. PAOLUCCI, E. PAOLINI, F. ALHAMED, M. SATLER, D. UOMO, M. GUAITOLINI, P. GONZALEZ, M. RUIZ, L. VELASCO, S. LAKI, D. KIS,

G. PONGRACZ, A. MIHALY, A. DALGKITSIS, C. PAPAGIANNI, A. NANOS, S. PARKER, V. LEFEBVRE, M. ANGOUSTURES, J. J. VEGAS

OLMOS, A. SGAMBELLURI

- DOI: <https://doi.org/10.1016/j.comnet.2026.112443>

Computer Networks

2026

Building the Association-Based Continuum: From Resource Isolation to Federation

A. KRETSIS, P. KOKKINOS, E. CANOVAS MARTINEZ, A. SKARMETA, A. NANOS, D. SYRIVELIS, I. PAEZ, J. MARTIN, A. FERNANDEZ

GOMEZ, T. CHALAZAS, J. BAUWENS, M. A. SIPOS, D. E. LUCANI RÖTTER, P. VELHO, Y. GEORGIOU, J. FÚSTER DE LA FUENTE, R.

GONZALEZ, E. VARVARIGOS

ICE/ITMC 2026

2026

Harnessing Artificial Intelligence for Early Identification of Autism Spectrum Disorder

A. VITANIDI, A. NANOS

- DOI: <https://doi.org/10.4018/979-8-3693-8176-2.ch002>

Book chapter, IGI Global

2025

Augmented Reality in the DESIRE6G Cloud-native and Programmable Infrastructure with Multi-Agent System and Pervasive Monitoring

F. PAOLUCCI, M. GUAITOLINI, A. SGAMBELLURI, F. ALHAMED, D. UOMO, E. PAOLINI, M. SATLER, P. GONZALEZ, M. RUIZ, L.

VELASCO, S. PARKER, S. PRYOR, G. PONGRACZ, A. MIHALY, A. DALGKITSIS, C. PAPAGIANNI, S. LAKI, D. KIS, A. NANOS, V.

LEFEBVRE, M. ANGOUSTURES, J. J. VEGAS OLMOS

- DOI: <https://doi.org/10.1109/CSCN67557.2025.11230754>

IEEE CSCN 2025

2025

MLIoT: Transparent and Secure ML Offloading in the Cloud-Edge-IoT Continuum

A. NANOS, C. MAINAS, K. PAPAZAFEIROPOULOS, A. GIANNOUSAS, I. LAGOMATIS, A. KRETSIS

CCGrid 2025 Workshops

2025

Integrating Heterogeneous Hardware and Software Platforms towards the Edge-Cloud-HPC Continuum

A. KRETSIS, P. KOKKINOS, P. SOUMPLIS, F. KOUZINOS, Y. ZACK, M. FEHÉR, M. SIPOS, D. E. LUCANI, K. TOKMAKOV, J. F. GHOTBI, D. MASOUIROS, K. SIOZIOS, P. BOURGOS, S. TSEKERIDOU, M. OIKONOMIDOU, F. ZYULKYAROV, E. KARANASTASIS, E. CHONDROGIANNIS, V. ANDRONIKOU, A. F. GOMEZ, A. SPĂȚARU, G. IUHASZ, C. MAINAS, A. NANOS, J. JOSE VEGAS OLMOS, M. VARVARIGOS

• DOI: <https://doi.org/10.1109/mcomstd.2025.3571130>

IEEE Commun. Stand. Mag.

2025

Enabling Cloud-native IoT Device Management

A. NANOS, I. PLAKAS, G. NTOUTSOS, C. MAINAS

• DOI: <https://doi.org/10.1145/3642975.3678967>

MetaOS 24, EuroSys 24

2024

Sandboxing Functions for Efficient and Secure Multi-tenant Serverless Deployments

C. MAINAS, I. PLAKAS, G. NTOUTSOS, A. NANOS

• DOI: <https://doi.org/10.1145/3642977.3652096>

SESAME 24, EuroSys 24

2024

EMPYREAN: Trustworthy, Cognitive and AI-driven Collaborative Associations of IoT Devices and Edge Resources for Data Processing

A. KRETSIS, P. KOKKINOS, E. VARVARIGOS, D. SYRIVELIS, P. BAKOPOULOS, M. SIPOS, M. FEHÉR, D. LUCANI, J. M. BERNABE, A. SKARMETA, I. PAEZ, L. COMINARDI, M. MERCIER, P. VELHO, Y. GEORGIU, C. MAINAS, A. NANOS, J. MARTIN, A. F. GOMEZ, R. GONZALEZ, P. ILIAS, T. CHALAZAS, K. CHINTAMANI

• DOI: <https://doi.org/10.1145/3625549.3658814>

HPDC 2024

2024

Security-Aware Resource Allocation in the Edge-Cloud Continuum

P. SOUMPLIS, G. KONTOS, A. KRETSIS, P. KOKKINOS, A. NANOS, E. VARVARIGOS

• DOI: <https://doi.org/10.1109/cloudnet59005.2023.10490073>

IEEE CloudNet 2023

2023

Towards extreme network KPIs with programmability in 6G

G. PONGRÁCZ, A. MIHÁLY, I. GÓDOR, S. LAKI, A. NANOS, C. PAPAGIANNI

• DOI: <https://doi.org/10.1145/3565287.3617610>

MobiHoc 2023

2023

A Minimal Testbed for Experimenting with Flexible Resource and Application Management in Heterogeneous Edge-Cloud Systems

A. PATRAS, F. POURNAROPOULOS, N. BELLAS, C. D. ANTONOPOULOS, S. LALIS, M. GOUTH, A. NANOS

EWSN 2023

2023

Secure, Privacy-Preserving, and Trustworthy Networks

A. KOSTOPOULOS, L. CHRISTOFIS, I. CHOCHLIOUROUS, J. COSMAS, S. DE CAPITANI DI VIMERCATI, I. GIANNOULIS, R. GONZALEZ, B. HAN, C. KLITIS, A. NANOS, J. NAWAR, S. OUKEMENI, S. ROBITZSCH, P. SAMARATI, G. SIRACUSANO, M. WEH, M. YIN

• DOI: <https://doi.org/10.1561/9781638282396.ch8>

Book chapter, Now Publishers

2023

Enabling an Isolated and Energy-Aware Deployment of Computationally Intensive Kernels on Multi-tenant Environments

A. KOKKINIS, A. NANOS, K. SIOZIOS

• DOI: https://doi.org/10.1007/978-3-031-46077-7_27

SAMOS 2023

2023

The SERRANO platform: Stepping towards seamless application development & deployment in the heterogeneous edge-cloud continuum

A. FERIKOGLU, A. KOKKINIS, D. DANOPOULOS, I. OROUTZOGLU, A. NANOS, S. KARANASTASIS, M. SIPOS, J. F. GHOTBI, J. J. VEGAS OLMOS, D. MASOUIROS, K. SIOZIOS

• DOI: <https://doi.org/10.23919/DATE56975.2023.10137039>

DATE 2023

2023

Intent-Based AI-Enhanced Service Orchestration for Application Deployment and Execution in the Cloud Continuum

E. CHONDROGIANNIS, E. KARANASTASIS, V. ANDRONIKOU, A. SPĂȚARU, A. NANOS, A. KRETSIS, P. KOKKINOS

• DOI: https://doi.org/10.1007/978-3-031-46235-1_17

ESOC 2023

2023

Advancements in Edge Computing and Service Orchestration in Support of Advanced Surveillance Services

I. MESOGITI, E. THEODOROPOULOU, F. SETAKI, G. LYBEROPOULOS, F. MOSCATELI, K. KANTA, G. GIANNOULIS, P. TOUMASIS, D. APOSTOLOPOULOS, H. AVRAMOPOULOS, L. LOPACINSKI, J. G. TERAN, A. NANOS, Y. LEIBA, M. ANASTASOPOULOS, A. TZANAKAKI

• DOI: https://doi.org/10.1007/978-3-031-08341-9_5

AIAI 2022 Workshops

2022

SERRANO: Transparent Application Deployment in a Secure, Accelerated and Cognitive Cloud Continuum

MeditCom 2021

A. KRETSIS, P. KOKKINOS, P. SOUMPLIS, J. J. V. OLMOS, M. FEHER, M. SIPOS, D. E. LUCANI, D. KHABI, D. MASOUIROS, K. SIOZIOS, P. BOURGOS, S. TSEKERIDOU, F. ZYULKYAROV, E. KARANASTASIS, E. CHONDROGIANNIS, V. ANDRONIKOU, A. F. GOMEZ, S. PANICA, G. IUHASZ, A. NANOS, C. CHALIOS, M. VARVARIGOS

Athens, Greece 2021

• DOI: <https://doi.org/10.1109/meditcom49071.2021.9647689>

Extending storage support for unikernel containers

WOSC 19, Middleware 19

O. L. NIKOLOS, K. PAPAZAFEIROPOULOS, S. PSOMADAKIS, A. NANOS, N. KOZIRIS

UC Davis, CA, USA 2019

• DOI: <https://doi.org/10.1145/3366623.3368138>

V4VSockets: Low-overhead Intra-node Communication in Xen

CloudDP 15, EuroSys 15

A. NANOS, S. GERANGELOS, I. ALIFIERAKI, N. KOZIRIS

Bordeaux, France 2015

• DOI: <https://doi.org/10.1145/2744210.2744215>

I/O Performance Modeling for Big Data Applications over Cloud Infrastructures

IC2E 2015

I. MYTILINIS, D. TSOU MAKOS, V. KANTERE, A. NANOS, N. KOZIRIS

Tempe, AZ, USA 2015

• DOI: <https://doi.org/10.1109/ic2e.2015.29>

Xen2MX: High-performance communication in virtualized environments

J. Syst. Softw.

A. NANOS, N. KOZIRIS

2014

• DOI: <https://doi.org/10.1016/j.jss.2014.04.036>

Xen2MX: Towards High-Performance Communication in the Cloud

VHPC 2012, Euro-Par 2012

A. NANOS, N. KOZIRIS

Rhodes, Greece 2012

• DOI: https://doi.org/10.1007/978-3-642-36949-0_64

A Smart HPC Interconnect for Clusters of Virtual Machines

VHPC 2011, Euro-Par 2011

A. NANOS, N. NIKOLERIS, S. PSOMADAKIS, E. KOZYRI, N. KOZIRIS

Bordeaux, France 2011

• DOI: https://doi.org/10.1007/978-3-642-29740-3_45

Coexisting Scheduling Policies Boosting I/O Virtual Machines

VHPC 2011, Euro-Par 2011

D. ARAGIORGIS, A. NANOS, N. KOZIRIS

Bordeaux, France 2011

• DOI: https://doi.org/10.1007/978-3-642-29740-3_46

Exploring I/O Virtualization Data Paths for MPI Applications in a Cluster of VMs: A Networking Perspective

VHPC 2010, Euro-Par 2010

A. NANOS, G. GOUMAS, N. KOZIRIS

Ischia, Italy 2010

• DOI: https://doi.org/10.1007/978-3-642-21878-1_82

GMBlock: Optimizing data movement in a block-level storage sharing system over Myrinet

Cluster Computing

E. KOUKIS, A. NANOS, N. KOZIRIS

2010

• DOI: <https://doi.org/10.1007/s10586-009-0106-y>

MyriXen: Message Passing in Xen Virtual Machines over Myrinet and Ethernet

VHPC 2009, Euro-Par 2009

A. NANOS, N. KOZIRIS

Delft, Netherlands 2009

• DOI: https://doi.org/10.1007/978-3-642-14122-5_45

Synchronized send operations for efficient streaming block I/O over Myrinet

CAC 2008, IPDPS 2008

E. KOUKIS, A. NANOS, N. KOZIRIS

Miami, FL, USA 2008

• DOI: <https://doi.org/10.1109/ipdps.2008.4536142>

Presentations & Posters

Brig: the microVM sandbox for AI coding agents

Heraklion, Greece

DEVSTAFF MEETUP: SANDBOXING AI CODING AGENTS

Oct. 8, 2026

• <https://www.meetup.com/devstaff/events/316766900/>

IoT Compute Unleashed: Transparent Offload From ESP32 To Edge Clusters

Amsterdam, Netherlands

KUBERNETES ON EDGE DAY, KUBECON + CLOUDNATIVECON EUROPE

Mar. 23, 2026

• <https://colocatedeventseu2026.sched.com/event/2DY25>

Streamlining WebAssembly Builds with Bunny

Amsterdam, Netherlands

WASMCON EUROPE, KUBECON + CLOUDNATIVECON EUROPE

Mar. 23, 2026

• <https://colocatedeventseu2026.sched.com/event/2Jd0B>

Bringing BSD Applications on Linux container platforms with urunc

BSD, ILLUMOS, BHYVE, OPENZFS DEVROOM, FOSDEM

- <https://archive.fosdem.org/2026/schedule/event/KPHKNU-bringing-bsd-applications-on-linux/>

Brussels, Belgium

Jan. 31, 2026

Beyond TinyML: Balance inference accuracy and latency on MCUs

AI PLUMBERS DEVROOM, FOSDEM

- <https://archive.fosdem.org/2026/schedule/event/X9XTL3-mlilot/>

Brussels, Belgium

Jan. 31, 2026

Cloud Native IoT: OTA Updates and Device Repurposing With K8s

OPEN SOURCE SUMMIT EUROPE

- <https://osseu2025.sched.com/event/25Vqj>

Amsterdam, Netherlands

Aug. 26, 2025

WASM meets unikernels: Secure and Efficient Cloud-Native Deployments

WEBASSEMBLY DEVROOM, FOSDEM

- <https://archive.fosdem.org/2025/schedule/event/fosdem-2025-6292-wasm-meets-unikernels-secure-and-efficient-cloud-native-deployments/>

Brussels, Belgium

Feb. 2, 2025

Less overhead, strong isolation: Running containers in minimal specialized Linux VMs

CONTAINERS DEVROOM, FOSDEM

- <https://archive.fosdem.org/2025/schedule/event/fosdem-2025-6284-less-overhead-strong-isolation-running-containers-in-minimal-specialized-linux-vms/>

Brussels, Belgium

Feb. 1, 2025

Expose Hardware Acceleration Functionality for Secure and Efficient Execution in Cloud Environments

FOSSCOMM

- <https://2024.foscomm.gr/agenda.html>

Thessaloniki, Greece

Nov. 10, 2024

Exploring Kata-Containers: Enhancing Cloud Security and Performance

OPENINFRA DAY HUNGARY

- <https://www.youtube.com/watch?v=2pNo8F3AMrw>

Budapest, Hungary

Jun. 3, 2024

Enabling Cloud-native IoT Device Management

MECC WORKSHOP, EUROSYS

- <https://mlsysops.eu/newsitem/presentation-at-mecc-2024/>

Athens, Greece

Apr. 22, 2024

Unikernels in K8s: Performance and Isolation for Serverless Computing with Knative

KUBECON + CLOUDNATIVECON EUROPE

- <https://kccnceu2024.sched.com/event/1YeRd>

Paris, France

Mar. 22, 2024

A Modular Approach to Effortless and Dependency-Aware Unikernel Building

MICROKERNEL AND COMPONENT-BASED OS DEVROOM, FOSDEM

- <https://archive.fosdem.org/2024/schedule/event/fosdem-2024-3456-a-modular-approach-to-effortless-and-dependency-aware-unikernel-building/>

Brussels, Belgium

Feb. 3, 2024

URUNC: A Unikernel Container Runtime

OPEN SOURCE SUMMIT EUROPE

- <https://osseu2023.sched.com/event/10GgY>

Bilbao, Spain

Sep. 20, 2023

Hardware acceleration for Unikernels: A status update of vAccel

MICROKERNEL AND COMPONENT-BASED OS DEVROOM, FOSDEM

- <https://archive.fosdem.org/2023/schedule/event/hwacceluk/>

Brussels, Belgium

Feb. 5, 2023

vAccel: Interoperable Application Hardware Acceleration

DUAC: 2ND INTERNATIONAL WORKSHOP ON DEPLOYMENT AND USE OF ACCELERATORS, ICPP

Bordeaux, France (Virtual Event)

Aug. 29, 2022

Unikernels for Serverless Computing

OPENINFRA SUMMIT

- <https://www.openstack.org/videos/berlin-2022/Unikernels-for-Serverless-Computing>

Berlin, Germany

Jun. 7-9, 2022

Interoperable Hardware Acceleration for Serverless

OPENINFRA SUMMIT

- <https://www.openstack.org/videos/berlin-2022/Interoperable-Hardware-Acceleration-for-Serverless>

Berlin, Germany

Jun. 7, 2022

Hardware accelerated applications on Unikernels for Serverless Computing

MICROKERNEL AND COMPONENT-BASED OS DEVROOM, FOSDEM

- <https://archive.fosdem.org/2022/schedule/event/anano/>

Brussels, Belgium

Feb. 5-6, 2022

ML inference acceleration for lightweight VMMs

VIRTUALIZATION AND IAAS DEVROOM, FOSDEM

• https://archive.fosdem.org/2021/schedule/event/vai_ml_lightweight_vmms/

Brussels, Belgium

Feb. 6-7, 2021

Lightweight Hypervisors in the Cloud and at the Edge

VIRTUALIZATION AND IAAS DEVROOM, FOSDEM

• https://archive.fosdem.org/2020/schedule/event/vai_lightweight_virt_at_the_edge/

Brussels, Belgium

Feb. 2-3, 2020

Systems software for HPC

CONVERGENCE OF BIG-DATA ANALYTICS, CLOUD, AND HIGH-PERFORMANCE COMPUTING WITH EVOLVE, HIPEAC CSW

Bilbao, Spain

Oct 30, 2019

Unikernel Support for NFV-like Applications on Xen ARM 64bit

DESIGN SESSION, XEN SUMMIT

Budapest, Hungary

Jul. 2017

Hypervisor support for emerging scale-out/scale-up architectures

VHPC 17, ISC-HPC 2017

Frankfurt, Germany

Jun 22, 2017

High-performance I/O in Virtualized environments

INVITED TALK, CARV GROUP, FORTH-ICS

Heraklion, Greece

Nov. 2013

I/O in Virtualized environments

INVITED TALK, WBI SEMINAR, HUMBOLDT UNIVERSITY OF BERLIN

Berlin, Germany

Jun. 2013

Experimenting with I/O data paths in Virtualized Environments

ASPLOS 2012 DOCTORAL WORKSHOP

London, UK

Mar. 2012

High-Performance I/O in Virtualized Environments: A Networking Perspective

EUROSYS 2010 DOCTORAL WORKSHOP

Paris, France

Apr. 2010

System-level Support for Heterogeneous Architectures

POSTER IN ARM RESEARCH SUMMIT

Cambridge, UK

Sep. 11-13 2017

Towards an HPC I/O framework for clusters of Virtual Machines

POSTER IN ACACES 2011, HIPEAC SUMMER SCHOOL

Fiuggi, Italy

July 10-16, 2011

Deploying MPI applications in a cluster of Xen VMs: A Networking Perspective

POSTER IN ACACES 2010, HIPEAC SUMMER SCHOOL

Terrassa (near Barcelona), Spain

July 11-17, 2010

Message Passing in Xen VMs

POSTER, CLUSTER 2009

New Orleans, Louisiana, USA

Sep 2, 2009

Program Committees

2012-Present	Co-chair , Workshop on Virtualization for High-Performance Cloud Computing	<i>VHPC @ EuroPar, SC, ISC</i>
2015	Co-chair , Workshop on Dependable Parallel, Distributed and Network-Centric Systems	<i>DPDNS @ IPDPS</i>
2013	Co-chair , Workshop on Middleware on HPC and Big Data systems	<i>MHPC @ EuroPar</i>
2019-2021	TPC Member , Containers and New Orchestration Paradigms for Isolated Environments in HPC	<i>CANOPIE-HPC @ SC</i>
2019	TPC Member , IEEE/ACM International Symposium in Cluster, Cloud, and Grid Computing	<i>CCGrid</i>
2015 – 2016	TPC Member , Workshop on Dependable Parallel, Distributed and Network-Centric Systems	<i>DPDNS @ IPDPS</i>
2015	TPC Member , IEEE 4th Symposium on Network Cloud Computing and Applications	<i>NCCA</i>
2015 – 2017	Shadow PC member , European Conference on Computer Systems	<i>EuroSys</i>
2008 – 2010	External Referee , Workshop on Communication Architecture for Clusters	<i>CAC @ IPDPS</i>
2008	External Referee , International Conference on Parallel Processing	<i>ICPP</i>
2008	External Referee , International Forum on Next-Generation Multicore/Manycore Technologies	<i>IFMT</i>

Honors, Grants & Awards

2025	EU Horizon Europe open call , NEPHELE 2nd Open Call, "DROP", NBFC: €110k, PI-100%
2025 – 2026	EU I3 project , "AMBITIOUS", Budget: €6.27M, NUBIS: €85k (EU €59.5k), PI-100%
2024 – 2027	EU Horizon Europe project , "TEXTaiLES", Funding: €3.62M, NUBIS: €353.9k, PI-100%
2024 – 2027	EU Horizon Europe project , "EMPYREAN", Funding: €4.67M, NUBIS: €299.8k, PI-100%
2023 – 2025	EU Horizon Europe project , "DESIRE6G", Funding: €6.21M, NUBIS: €356.6k, PI-100%
2023 – 2026	EU Horizon Europe project , "MLSysOps", Funding: €5.71M, NUBIS: €480.2k, PI-100%
2021 – 2023	EU H2020 project , "SERRANO", Funding: €4.34M, NBFC: €330.7k, PI-100%
2019 – 2023	EU H2020 project , "5G-COMPLETE", Funding: €5.97M, NBFC: €280k, PI-100%
2010 – 2013	PhD thesis Scholarship , EU "IRAKLITOS II", Funding: €45k
2007 – 2010	PhD thesis Scholarship , Greek State Scholarships Foundation, Funding: €16k