

Curriculum Vitae

PERSONAL INFORMATION

Surname	MEMOS
Name	VASILEIOS
Date of Birth	20.03.1989
Place of Birth	Veroia
Residence	Thessaloniki
Citizenship	Greek
Religion	Christian Orthodox
E-mail	vamemos@mst.ihu.gr
Website	https://vmemos.wordpress.com/



ACADEMIC TITLES

- Doctor of Philosophy (PhD) in Applied Informatics (2018-2022) with research topic: “Novel Algorithms, Models and Architectures for Enhanced Cyber Security and Energy Efficiency in Internet of Things Environments”, Department of Applied Informatics, School of Information Sciences, University of Macedonia, Thessaloniki, Greece.
- Master of Science (MSc) in Applied Informatics (2015-2017) with specialization in: “Computer Systems and Network Technologies”, Department of Applied Informatics, School of Information Sciences, University of Macedonia, Thessaloniki, Greece.
- Bachelor of Science (BSc) in Technology Management (2007-2012), Department of Technology Management, University of Macedonia, Naousa, Greece.

COMPUTER CERTIFICATIONS

- ❖ Vellum Web and E-Shop Design Certificate
- ❖ Vellum International Diploma in IT and Cyber Security
- ❖ Unicert Primary (Word Processing, Spreadsheets, Internet Services, Databases, Presentations)

OTHER CERTIFICATIONS

- ❖ Certificate of Pedagogical and Teaching Proficiency, School of Information Sciences, Department of Applied Informatics, University of Macedonia
- ❖ Certificate of Training "Training in SDE Topics", KDVM goLearn
- ❖ Certificate of Training "Principles of Adult Education", KDVM goLearn
- ❖ Certificate of Training "Mental Health Promotion of Children and Adolescents", KDVM University of West Attica
- ❖ Certification "Private Security Service Personnel", EOPPEP-KEMEA
- ❖ Certificate of Knowledge of Computer Operation, Department of Technology Management, University of Macedonia

FOREIGN LANGUAGES

- ❖ Excellent Knowledge of English

RESEARCH INTERESTS

- Artificial Intelligence (AI)
- Big Data Analytics (BDA)
- Computer Systems and Networks
- Cloud Computing (CC)
- Cyber Security and Privacy
- Deep Learning (DL)
- Distributed Systems and Networks
- Ethical Hacking
- Haptic/Tactile Robotics
- Internet of Things (IoT)
- Machine Learning (ML)
- Next Generation Mobile Networks (5G-6G)
- Software Engineering
- Wireless Sensor Networks (WSN)

TEACHING EXPERIENCE

- 10.2022-today** Lecturer in International Hellenic University
- Department of Management Science and Technology (Kavala)
Courses:
“Software Engineering in Practice” (7th Semester)
“Development of Reliable and Secure Software” (6th Semester)
- 10.2022-today** Instructor in DIEK Epanomis
- Specialty: Network and Telecommunications Technician
Courses:
“Network Administration II” (3rd Semester)
- 10.2022-today** Professor in Mediterranean College – University of Derby, School of Computing
- BSc of Computer Science
Courses:
“Distributed Systems” (3rd year)
“Software Engineering” (2nd year)
 - BSc of Computer Networks & Security
Courses:
“Security Protocols” (3rd year)
“Ethical Hacking” (2nd year)
“Distributed Networks” (3rd year)
- 09.2022-today** Teacher in Secondary Education of Chalkidiki
- High School Classes of Galatista
Courses:
“Computer Applications” (1st Class)
“Application Development in Programming Environment” (3rd Class)
 - Daily Gymnasium of Galatista
Courses:
“Informatics” (3rd Class)
 - Daily Gymnasium of Saint Nicholas Sithonias
Courses:
“Informatics” (1st, 2nd, 3rd Class)
 - EPAL Nikitis
Courses:

“Computer Networks” (3rd Class)

- 03.2022-06.2022** Teacher in Second Chance Schools
- 3rd SDE, General Penitentiary of Thessaloniki (Diavata)
Courses:
“Computer Literacy I” (1st year)
“Computer Literacy II” (2nd year)
- 01.2022-06.2022** Teacher in Secondary Education of West Thessaloniki
Refugee Reception and Education Structures
- Daily Gymnasium of Koronia (Lagkadikia)
Courses:
“Informatics”
 - 2nd Gymnasium of Stavroupoli
Courses:
“Informatics”
- 11.2022-06.2022** Instructor in IIEK AKMI
- Specialty: Computer Technician
Courses:
“Interdisciplinary Work ” (4th Semester)
“Operation Systems I” (1st Semester)
 - Specialty: Automation Technician
Courses:
“Industrial Informatics” (4th Semester)
“Computer Programming” (3rd Semester)
 - Specialty: Rescuer - Ambulance Crew
Courses:
“Communication Systems” (2nd Semester)
- 12.2021-02.2022** Instructor in DIEK Pylaias - Chortiati
- Specialty: Multimedia/Web Designer - Developer /VideoGames
Courses:
“Data Communications” (1st Semester)
- 11.2021-02.2022** Instructor in DIEK Neapolis
- Specialty: Multimedia/Web Designer - Developer /VideoGames
Courses:
“Data Communications” (1st Semester)
- 05.2021-09.2021** Remedial and Assistant Lecturer (as Academic Scholar) in University of Macedonia
- Department of Applied Informatics
Courses:
“Mobile and Pervasive Computing” (8th Semester)
“Communication Systems” (4th Semester)
- 02.2021-06.2021** Co-Assistant Lecturer in University of Macedonia (in the context of PhD Thesis preparation)
- Department of Applied Informatics
Courses:
“Mobile and Pervasive Computing” (8th Semester)
“Communication Systems” (4th Semester)
- 10.2018-01.2020** Co-Assistant Lecturer in University of Macedonia (in the context of PhD Thesis preparation)

- Department of Applied Informatics
Courses:
“Unified Communications and Applications” (7th Semester)
“Business Data Communications” (7th Semester)

WORK EXPERIENCE

- 09.2020-07.2021** Computer Engineer (computer engineering, administration of computer network and telecommunication systems, technical support of computer systems), National Emergency Center (EKAB) / National Center for Health Operations (EKEPY)
- 02.2019-01.2020** Administrative Officer - Computer Scientist (providing administrative services and IT support), 2nd Vocational Apprenticeship School of Thessaloniki (OAED)
- 08.2015-11.2017** Control Room Operator & IT Security (providing physical and electronic security), Falcon Security GS
- Hellenic Post - Thessaloniki Sorting Center (Oraiokastros, Thessaloniki)
 - LIDL HELLAS & SIA O.E. (Sindos, Thessaloniki)
 - Various shops and facilities of Thessaloniki region
- 07.2011-10.2011** Administrative Officer – Computer Scientist (providing administrative services and IT support), Economic Chamber of Greece (OEE) (Veroia)
- 12.2010-05.2011** Office Clerk (Cashier) – Computer Scientist (opening and managing bank accounts, cashier duties, IT support), Hellenic Post (ELTA) (Veroia)

ADDITIONAL ACTIVITIES - EMPLOYMENT

- Review Editor of the Journal: Frontiers in Energy Efficiency (on the special issues: “Energy Efficiency Technologies” and “IoT in Energy Efficiency”)
- Technical Committee Member in the “Information Technology and Applications Symposium (ITAS 2023)”, Shonan Institute of Technology, Japan
- Technical Committee Member in the “5th World Symposium on Communication Engineering (WSCE 2022)”, Nagoya University, Japan
- Supervisor of 13 students’ BSc Theses, School of Computing, Mediterranean College
- Co-supervisor of many students’ BSc and MSc Theses, University of Macedonia
- Involved in writing proposals in funded research projects (ELIDEK, EPAnEK, Horizon, etc.)
- Research member of Mobility2Net Lab Japan-EU R&D (Director: K. Psannis)
- Reviewer of International Scientific Conferences and Journals (review over 250 research papers IEEE, Springer, Elsevier, MDPI, etc.)
- Computer and Network Technical Support – Website Design, Development and Management (occasionally)
- Delivery of IT courses remotely (occasionally)
- Operator of wireless/wired media and communication systems (ASDA “Pyrseia”, Cryptographic, Call Center, SEZM “Ermis”), Communications Center (KEPIK), Greek Army (during military service)
- Attending numerous scientific lectures and conferences

PUBLICATIONS

Papers in Scientific Journals

- **V. Memos**, K. Psannis and Z. Lv, "A Secure Network Model against Bot Attacks in Edge-enabled Industrial Internet of Things," in IEEE Transactions on Industrial Informatics, Vol. 18, No. 11, pp. 7998-8006, November 2022.

- **V. Memos** and K. Psannis, "Optimized UAV-based Data Collection from MWSNs", ICT Express, Elsevier, Article in Press, October 2022.
- K. Stergiou, G. Minopoulos, **V. Memos**, C. Stergiou, M. Koidou, and K. Psannis, "A Machine Learning-Based Model for Epidemic Forecasting and Faster Drug Discovery," Applied Sciences, MDPI, Vol. 12, No. 21, p. 10766, October 2022.
- G. Minopoulos, **V. Memos**, C. Stergiou, K. Stergiou, A. Plageras, M. Koidou, and K. Psannis, "Exploitation of Emerging Technologies and Advanced Networks for a Smart Healthcare System", Applied Sciences, MDPI, Vol. 12, No. 12, p. 5859, June 2022.
- **V. Memos** and K. Psannis, "NFV-Based Scheme for Effective Protection against Bot Attacks in AI-Enabled IoT," in IEEE Internet of Things Magazine, Vol. 5, No. 1, pp. 91-95, March 2022.
- **V. Memos**, and K. Psannis, "UAV-based Smart Surveillance System over a Wireless Sensor Network", accepted for publication in the Special Issue: Drone Networking, IEEE Communications Standards Magazine, vol. 5, no. 4, pp. 68-73, December 2021. *(Grant award by University of Macedonia)*
- **V. Memos**, G. Minopoulos, K. Stergiou, and K. Psannis, "Internet-of-Things-Enabled Infrastructure Against Infectious Diseases", Vol. 4, No. 2, pp. 20-25, IEEE Internet of Things Magazine, June 2021.
- **V. Memos**, K. Psannis, S. Kyriazakos, and S. Goudos, "An Enhanced and Secure Cloud Infrastructure for e-Health Data Transmission", Wireless Personal Communications (WIRE), Vol. 117, pp. 109-127, Springer, March 2021.
- **V. Memos**, "Efficient Multimedia Transmission over Scalable IoT Architecture", International Journal of Computer Network and Information Security (IJCNIS), Vol. 10, No. 6, pp. 27-39, MECS Press, June 2018.
- **V. Memos**, K. Psannis, Y. Ishibashi, B. Kim, and B. Gupta, "An Efficient Algorithm for Media-based Surveillance System (EAMSuS) in IoT Smart City Framework", Future Generation Computer Systems (FGCS), Vol. 83, pp. 619-628, Elsevier, May 2017. *(Grant award by University of Macedonia)*
- **V. Memos**, and K. Psannis, "Encryption Algorithm for Efficient Transmission of HEVC Media", Journal of Real-Time Image Processing (JRTIP), Vol. 2, I. 2, pp. 473-482, Springer, May 2015.

Books and Chapters in Books

- **V. Memos**, G. Minopoulos, and K. Psannis, "The Impact of IoT and 5G Technology in Telesurgery: Benefits & Limitations", New Technologies in Health: Medical, Legal and Ethical Issues, Medical Law and Bioethics Study Laboratory AUTH, Thessaloniki, Greece, February 2021.
- **V. Memos**, and K. Psannis, "A New Methodology based on Cloud Computing for Efficient Virus Detection", Lecture Notes in Electrical Engineering (LNEE), Vol. 312, pp. 37-47, Springer, 2015.

Publications/Posters in Conference Proceedings

- **V. Memos**, and K. Psannis, "Artificial Intelligence ANTi-Attack System (AIANTAS) for IoT Cyberspace: An Upcoming Cloud-based Security Architecture for Police Authorities", in Proceedings of 4th World Symposium on Communication Engineering (WSCE 2021) & 9th International Conference on Information, Communication and Networks (ICICN 2021), University of Macedonia (Greece), Shaanxi Normal University (Xi'an, China), pp. 259-263, November 2021. *(Best Research Paper Award in Session: Internet of Things and Communication Engineering)*
- **V. Memos**, and K. Psannis, "AI-powered Honeypots for Enhanced IoT Botnet Detection", 3rd World Symposium on Communication Engineering (WSCE 2020), University of Macedonia (Greece), pp. 64-68, October 2020.
- **V. Memos**, "Exploitation of Emerging Technologies in Combating Cybercrime: A Human Interactive - Machine Learning System for Police Authorities (HI-MLSPA)", 2nd International Conference on Big Data and Advanced Wireless Technologies (BDAW 2020), Cambridge, United Kingdom (UK), July 2020. *(to be published)*
- **V. Memos**, G. Minopoulos, C. Stergiou, K. Stergiou, A. Plageras, and K. Psannis, "Integration of Emerging Technologies for Enhanced Treatment of Infectious Diseases", 2nd International Conference on Big Data and Advanced Wireless Technologies (BDAW 2020), United Kingdom (UK), July 2020. *(to be published)*
- G. Minopoulos, K. Stergiou, **V. Memos**, and K. Psannis, "A Haptics Assisted Method for Improved Complication Detection on Medical Imaging Data", 2nd International Conference on Big Data and Advanced Wireless Technologies (BDAW 2020), United Kingdom (UK), July 2020. *(to be published)*
- K. Stergiou, G. Minopoulos, **V. Memos**, C. Stergiou, A. Plageras, and K. Psannis, "A Machine Learning Approach for Accelerating Drug Discovery against Epidemic Viruses", 2nd International Conference on

Big Data and Advanced Wireless Technologies (BDAW 2020), United Kingdom (UK), July 2020. *(to be published)*

- **V. Memos**, G. Minopoulos, C. Stergiou, K. Psannis, and Y. Ishibashi, “A Revolutionary Interactive Smart Classroom with the use of Emerging Technologies”, The 2nd International Conference on Computer Communication and the Internet (ICCCI 2020), Nagoya Institute of Technology (Japan), pp. 174-178, June 2020.
- G. Minopoulos, **V. Memos**, K. Psannis, and Y. Ishibashi, “Comparison of Video Codecs Performance for Real Time Transmission”, The 2nd International Conference on Computer Communication and the Internet (ICCCI 2020), Nagoya Institute of Technology (Japan), pp. 110-114, June 2020.
- **V. Memos**, K. Psannis, G. Minopoulos, G. Kokkonis, and Y. Ishibashi, “An Energy Efficient Scheme for IoT (EES4IoT)”, The 2nd World Symposium on Communication Engineering (WSCE 2019), Nagoya Institute of Technology (Japan), pp. 11-15, December 2019.
- **V. Memos**, G. Minopoulos, and K. Psannis, “The Impact of IoT and 5G Technology in Telesurgery: Benefits & Limitations”, in Proceedings of New Technologies in Health: Medical, Legal & Ethical Issues, Piraeus Bank Conference Centre, Thessaloniki (Greece), November 2019.
- **V. Memos**, and K. Psannis, “A New Security Model based on Cloud Computing for Efficient Threat Detection” 2nd Student Conference of the Dept. of Applied Informatics (FSTEP 2015), University of Macedonia, Thessaloniki (Greece), December 2015.
- **V. Memos**, and K. Psannis, “A New Methodology based on Cloud Computing for Efficient Virus Detection”, International Conference on Telecommunications and Networking (TeNe), 9th Annual International Joint Conferences on Computer, Information, Systems Sciences, & Engineering (CISSE), University of Bridgeport (Connecticut, USA), December 2013.

Invited Conference Keynote Speaker

- **V. Memos**, Invited Keynote Speaker: “Exploitation of Emerging Technologies in Combating Cybercrime”, 2nd International Conference on Big Data and Advanced Wireless Technologies (BDAW 2020), Cambridge, United Kingdom (UK), July 2020. *(to be published)*

Invited Speaker in Workshops

- **V. Memos**, Invited Talk: “Digital Technologies Facing the Pandemic: A Proposed Approach”, in Lecture: “Digital Technologies Facing the Pandemic”, 6th International Summer School of Medical Law in Bioethics on “Human Rights in Health”, Thessaloniki (Greece), July 2021.
- **V. Memos**, Invited Talk: “Improving Healthcare Through Integration of Innovative Technologies”, in Lecture: “Smart Hospitals: The future for care provision?”, 5th International Summer School of Medical Law in Bioethics on “Human Rights in Health”, Thessaloniki (Greece), July 2020.
- **V. Memos**, “The IoT Revolution: Applications, Challenges, and Solutions”, Mediterranean College, Thessaloniki (Greece), Forum: “Internet of Things & Compressed Big Data Analytics over Cloud”, September 2019.
- **V. Memos**, “Practical Application of Internet of Things (IoT)”, EESTech Challenge Hackathon Thessaloniki 2019 – Internet of Things, Aristotle University Research Dissemination Center, Thessaloniki (Greece), March 2019.

Other Publications (Theses/Dissertations)

- **V. Memos**, “Novel Algorithms, Models and Architectures for Enhanced Cyber Security and Energy Efficiency in Internet of Things Environments”, PhD Thesis, Dept. of Applied Informatics, University of Macedonia, July 2022.
- **V. Memos**, “Design and Development of Efficient Algorithm for Audio/Visual Surveillance Systems in Smart Cities”, Master Thesis, Dept. of Applied Informatics, University of Macedonia, October 2017.
- **V. Memos**, “Computer and Network Protection Techniques”, Bachelor Thesis, Dept. of Technology Management, University of Macedonia, June 2012.