PROFESSIONAL SUMMARY

The foundation for my career began over thirty years ago with a Doctorate in Electrical Engineering.

I am currently an Adjunct Professor in Network Engineering Program at SMU's Graduate School of Electrical and Computer Engineering. I am also the owner of Olivier Consulting, where I provide consulting services for advanced network / system design along with IP consulting. In 2022 I was appointed Research Professor at SMU's Hunt Institute for Engineering and Humanity specializing in Transformational Technologies. Recently I have recently received a Fulbright Specialist Award in the area of Computer Science.

I have three degrees from The Ohio State University: a Bachelor of Science degree in Electrical Engineering; a Master of Science degree in in Electrical Engineering and a Doctor of Philosophy degree in Electrical Engineering. I have published papers in the areas in fault tolerant computing and error detection in multiprocessor computer systems.

Over the last 20 years I have devoted my attention to industry consulting in the areas of intellectual property and networking technologies.

EDUCATION PROFILE

Ph.D. Electrical Engineering, The Ohio State University, Columbus, Ohio, 1988 Dissertation: "Concurrent Error Detection in Arithmetic Processors using GAN Codes", Received separate minors in fields of Computer Science, Fault Tolerant Computing, and Discrete Mathematics.

Recipient of the prestigious Kodak Fellowship, awarded nationally to 12 doctoral students in the fields of science and engineering.

MS. Electrical Engineering, The Ohio State University, Columbus, Ohio, 1985 Thesis: "A Navigation System for a Vehicle with a Laser Rangefinder"; Major areas of study were robotics and artificial intelligence.

BS. Electrical Engineering, The Ohio State University, Columbus, Ohio, 1983 Cum Laude.

PUBLICATIONS

Roku Exhibit 1004 Roku v. Videolabs

Olivier, J., Ozguner, F. "A navigation algorithm for an intelligent vehicle with a laser rangefinder", Proceedings of the 1986 IEEE International Conference on Robotics and Automation, Vol. 3, April 1986.

Olivier, J. L. and Ozguner, F. "Design of Concurrent Error Detecting Systolic Arrays Using GAN Codes" IEEE Transactions on Computer Aided Design, vol. 9, no. 10 October 1989.

Olivier, J.L. "Low Cost Residue Prediction for Improved Addition Efficiency", G. M. Research Publication, December 1989.

Olivier, J.L. and Tkacik, T.E., "RELY, a Markov Modeling Package for System Reliability Prediction" G.M. Research Publication, January 1990.

EXPERIENCE PROFILE

2022 – 2023 Research Professor at SMU's Hunt Institute for Engineering and Humanity Southern Methodist University

 Program Lead of Hunt Institute's Transformational Technology Hub responsible for strategy formulation and project implementation.

2019 – 2022 Program Lead and Adjunct Executive in Residence SMU's Hunt Institute for Engineering and Humanity Southern Methodist University

 Program Lead of Hunt Institute's Transformational Technology Hub responsible for strategy formulation and project implementation.

2018- 2024 Faculty Fellow at the SMU Hunt Institute for Engineering and Humanity at the SMU Lyle School of Engineering.

2017 – present Adjunct Professor for Network Engineering Program at Southern Methodist University's Lyle School of Electrical Engineering

 Teaching Advanced Switching and Routing with MPLS at SMU's nationally rated Network Engineering program. Research interests include Fault Tolerant Algorithms, Video Transport, SD-WANs, Blockchain, IoT, and In-Networking Processing.

2003 - present Olivier Consulting - Dallas Texas IP Consultant McAlexander Sound

 Technology Research and Intellectual Property Management, including, IP Protection, IP Validity, IP Portfolio Valuation, IP Strategy and IP Technical Consultation. Clients include Arista Networks, HTC Corporation, T-Mobile, Samsung, Vizio, Google Corporation, Level 3 Communications, AT&T, Amazon, Ericsson, and S.T Microelectronics.

Recognized Expert before United States Federal District Courts in the Areas of

- Congestion Control in Packet Switching QPSX v Nortel 2:05-CV-268, 2007
- Cellular High Speed Packet Access Networks
 Wi-LAN Inc., v. Alcatel-Lucent et. al CV-6:10, 2013
- Signaling Protocols in Cellular Networks
 Core Wireless Licensing S.A.R.L v. Apple 6:12-CV-100, 2015

Recognized Expert before the International Trade Commission in the Areas of

- Security and Firewalls in Routers and Switches; Investigation 337-TA-628, 2007
- Cellphone Hardware and Software for Imaging; Investigation 337–TA-726, 2010
- Operating Systems for Mobile Devices; Investigation 337–TA-744, 2011
- Mobile Devices Hardware and Software Architectures; Investigation 337—TA-850, 2012
- Ethernet Switch Packet Processor Hardware and Software;
 Investigation 337–TA-945, 2015

Lead Technology Research and Intellectual Property investigations in the following areas

- Technology related to mobile camera system's software systems architecture. HTC Corporation
- Technology related to gateway protocols between Cellular /PSTN Networks and the Internet. Investigated the design of a Packet Gateway and associated soft switch. Level 3 Communications
- Technology related to content delivery server systems based on demographic information received from client systems. AT&T
- Technology investigation related to Metro Ethernet, MPLS, 802.17, and 802.3 access products. Transpacific IP
- Technology investigation related to the research, specification, design, and architecture of the Telstrat's Next Generation Switch, which provided video, including analog, digital, HDTV, along with IP based voice, and also provided internet service. Telstrat
- Technology investigation into the specification, design, and architecture of the Crane Wireless Sensor Network. Investigated scalability, address assignment, access, and security for a large IoT Wireless Sensor Network. Crane Aerospace

2002 - 2003 Navini Networks - Richardson, Texas Senior Manager

• Performed research and development in Navini's Wireless CDMA broadband System. Responsible for definition and implementation of layer 2 and layer 3 network protocols for Navini's Broadband Wireless Products. Developed servers for network security, network services, service provisioning and subscriber management for a CDMA network. Responsible for the design and development of a sign-on web site which managed and authorized users for different services in a broadband CDMA network. This system consisted of multiple Apache Web Servers providing the web pages to the users and a centralized key storage facility to manage the various keys needed to authorize the different services.

1999 – 2002 Marconi Communications - Irving, Texas Manager of Systems Engineering

Responsible for design and development of new products and product evolution for Marconi's North American Access Division. I developed systems for the access video market, such as Digital Subscriber Line (DSL) networks, Hybrid fiber-coaxial (HFC) networks and DOCSIS systems. These systems were triple play systems which provide voice, video and data. While at Marconi, I was also responsible for the web servers design for the Network Management System for the North American Access product division.

1996– 1999 Samsung Telecommunications America - Richardson, Texas Principal Engineer

Responsible for Service Control subsystem of Samsung's next generation wireless broadband UMTS switching system. Designed and developed a Java based platform for defining services for Samsung's next generation high-speed wireless switch. Areas of responsibility include traditional telephony services, wireless services, broadband services, and Internet services, such as an email portal. While at Samsung, I was also their corporate representative to the International Telecommunication Union, ("ITU"), which is the agency of the United Nations responsible for information and communication technologies. I was also Samsung's corporate representative to the 3GPP standards body. It was there that I participated in the development of standards for advanced wireless networks, including multimedia transport.

1995 – 1996 DSC Communications Switch Products Division – Plano, Texas

Senior Manager: Intelligent Network Evolution and Business Planning

 Responsible for architecture and development of DSC's Intelligent Network product line. These products demonstrated at SuperComm 1996; a U.S. telecommunications trade show showed the integration of streaming media servers together with the interactivity of the Internet. I also actively interacted with key customers on their system designs and participated in relevant standards work.

Senior Manager: ATM Systems Engineering Group

 Lead the systems engineering group in defining a new high-speed ATM switches for enterprise and telecommunication networks. These efforts

include, multiprocessor architectures, communications subsystems, and software architectures. In addition, I was responsible for responding to RFIs and RFPs for a number of clients server based multimedia systems and served as DSC corporate representative to the ATM Forum.

1990 – 1995 AT&T Bell Laboratories - Columbus, Ohio Member of Technical Staff

 Designed and implemented a variety of fault tolerant multiprocessor systems for use in the computer/multimedia systems. These systems included Asynchronous Transfer Mode 'ATM' based Internet and video distribution system. I also participated in the design and development of client server based systems for database access. Developed fault detection and fault recovery algorithms for AT&T products.

1989 – 1990 General Motors Research Laboratories Warren Michigan

Senior Research Engineer: Computer Science

Department

 Conducted research into basic computer science problems associated with the future development of vehicular systems. These areas include the design of fault tolerant control systems, new cost affective microprocessor architectures and software for reliability and performance modeling. Lead the development of an automotive testbed for the evaluation of prototype systems.

1988 – 1989 Harris Communications – Melbourne, Florida Principal Engineer

 Conducted research and development into innovative computer systems for use in space systems. Studied coherency protocols for microprocessor memory systems. Developed fault tolerant multiprocessor computer systems for use in Strategic Defense Initiative.

ISSUED PATENTS AND PATENT APPLICATIONS

- US 8334775 RFID-based asset security and tracking system, apparatus and method Network based asset management system.
- US 20090174772 Security and surveillance system Network based surveillance and security system.
- US 20130201337 Rfid-based asset security and tracking system, apparatus and method
 Network based asset management system.

ADDITIONAL ACTIVITIES

Member of the Social Enterprise Advisory Council at the Hunt Institute for Engineering & Humanity, a member of the United Nations Sustainable Development Solutions Network.

Fellow at SMU's Hunt Institute for Engineering and Humanity.

Chairman of IEEE Dallas Blockchain Group

Cases Worked Past 5 Years

Year Engaged

2024

Expert Engagement: IPR

Type of Matter: Provide Opinion

Case Name: IPR2024-00590 and IPR2024-00593

Engaged on behalf of: Identitii Limited

Technology at Issue: Blockchain based Systems

Services Provided: Consulting

Law Firm: Bunsow De Mory

Year Engaged: 2024

Expert Engagement: Litigation

Type of Matter: Provide Opinion

Case Name: Foras Technologies Limited vs Bayerische Motoren Werke

AG and Robert Bosch GMBH Case No. 6:23-cv-00386

Engaged on behalf of: Bayerische Motoren Werke AG ("BMW") and Robert Bosch

GMBH ("Bosch")

Technology at Issue: Fault Tolerant Computer Systems

Services Provided: Consulting

Law Firm: Finnegan, Henderson, Farabow, Garrett & Dunner

Year Engaged: 2024

2022

Expert Engagement: Licensing
Type of Matter: Consulting

Case Name:

Engaged on behalf of: Ericsson

Technology at Issue: Power Control in Cellular Networks

Services Provided: Consulting Law Firm: BakerBotts

Year Engaged: 2022

Expert Engagement: Litigation

Type of Matter: Provide Opinion

Case Name: Telecom Network Solutions, LLC v. T-Mobile USA, Case

No. 2:21-cv-00418-JRG

Engaged on behalf of: T-Mobile and Sprint Spectrum

Technology at Issue: QoS in Cellular Networks

Services Provided: Consulting

Law Firm: K&L Gates LLP

Year Engaged: 2022

Expert Engagement: IPR

Type of Matter: Inter partes review

Case Name: PTAB IPR on

U.S. Patent No. 7,623,033 and 8,766,797

Engaged on behalf of: Qualcomm

Technology at Issue: Sensor networks
Services Provided: Wrote Declarations

Law Firm: Norton Rose

Year Engaged: 2022

Expert Engagement: Litigation

Type of Matter: Inter partes review

Case Name: PTAB IPR on

U.S. Patent No. 10,325,159

Engaged on behalf of: Vivint

Technology at Issue: Electronic Monitoring
Services Provided: Wrote Declarations
Law Firm: Foley and Lardner

Year Engaged: 2022

Expert Engagement: Patent Review

Type of Matter: Inter partes review

Case Name: PTAB IPR on

U.S. Patents No. 9,965,233, 9,389,822

Engaged on behalf of: Roku, Inc.

Technology at Issue: Protected or Encrypted Content delivery over Internet

Services Provided: Wrote Declarations

Law Firm: Perkins Coie

Year Engaged: 2022

Expert Engagement: Litigation

Type of Matter: Expert Consulting

Case Name: Corrigent Corporation v. Cisco Systems, Dell and Arista

Networks 6:22-cv-00396-ADA-DTG, 1:22-cv-00496-RGA,

22-497-RGA

Engaged on behalf of: Corrigent Corporation.

Technology at Issue: 3GPP Network Elements

Services Provided: Wrote Declarations
Law Firm: Steptoe & Johnson

Year Engaged: 2022

<u>2021</u>

Expert Engagement: Litigation

Type of Matter: Inter partes review Case Name: PTAB IPRs on

U.S. Patent No. 7,979,070, 8,879,503

Engaged on behalf of: Thales AIS DIS

Technology at Issue: Signaling Messages in 3GPP networks

Services Provided: Wrote Declaration
Law Firm: AddyHart LLP

Year Engaged: 2021

Expert Engagement: Litigation

Type of Matter: Inter partes review

Case Name: PTAB IPR on

U.S. Patent No. 10,346,114

Engaged on behalf of: Roku, Inc.

Technology at Issue: Content delivery over wireless networks

Services Provided: Wrote Declarations

Law Firm: Perkins Coie

Year Engaged: 2021

Expert Engagement: Litigation

Type of Matter: Inter partes review

Case Name: PTAB IPR on

U.S. Patent No. 7,580,388

Engaged on behalf of: Thales AIS DIS

Technology at Issue: Signaling Messages in 3GPP networks

Services Provided: Wrote Declarations

Law Firm: AddyHart LLP

Year Engaged: 2021

Expert Engagement: PTAB

Type of Matter: Inter partes review
Case Name: PTAB IPR on

U.S. Patent No. 9,54,426, 10,924,500, and 9,372,098

Engaged on behalf of: Ericsson Inc.

Technology at Issue: Signaling Messages in 3GPP networks
Services Provided: Wrote Declaration, Deposition Testimony

Law Firm: Baker Botts

Year Engaged: 2021

Expert Engagement: PTAB

Type of Matter: Inter partes review

Case Name: PTAB IPRs or PGR on

U.S. Patent No. 10,601,948, 11,190,622, 11,206,317,

11,272,034, 11,349,953, 11616826, 10,965,770

Engaged on behalf of: Metacluster

Technology at Issue: Computer networks

Services Provided: Wrote Declarations, attended depositions

Law Firm: Norton Rose

Year Engaged: 2021

2020

Expert Engagement: Litigation
Type of Matter: Patent

Case Name: Intellectual Ventures I LLC and Intellectual Ventures II LLC

v. VMware, Inc., Western District of Texas Case No. 6:19-

cv-449

Engaged on behalf of: VMware

Technology at Issue: Layer 3 Networking Services Provided: Wrote Declaration Law Firm: Winston & Strawn

Year Engaged: 2020

Expert Engagement: Litigation

Type of Matter: Patent

Case Name: Exafer Ltd. v. Microsoft Corporation, Case No: 20-CV-

00131 ADA

Engaged on behalf of: Microsoft

Technology at Issue: Layer 2 forwarding in Data Center

Services Provided: Wrote Declarations, attended depositions

Law Firm: Winston & Strawn

Year Engaged: 2020

Expert Engagement: Litigation

Type of Matter: Copyright

Case Name: Apple Inc. v Corellium, LLC

CASE NO. 9:19-cv-81160-rs Southern District of Florida

Engaged on behalf of: Corellium LLC

Technology at Issue: Software and image copyrights

Services Provided: Wrote Declaration, attended deposition

Law Firm: Hecht Partners LLP

Year Engaged: 2020

Expert Engagement: Litigation

Type of Matter: Inter partes review

Case Name: PTAB IPR on

U.S. Patent No. 7,894,443

Engaged on behalf of: Thales AIS DIS
Technology at Issue: Radio Link Control
Services Provided: Wrote Declaration
Law Firm: AddyHart LLP

Year Engaged: 2020

Expert Engagement: Litigation

Type of Matter: Inter partes review

Case Name: Sisvel International S.A. and 3G Licensing S.A. v.

Cradlepoint, Inc., Case No. 1:19- CV-1142-MN (District of

Delaware)

Engaged on behalf of: Cradlepoint and Sierra Wireless

Technology at Issue: Radio Link Control Services Provided: Wrote Declaration

Law Firm: Perkins Coie

Year Engaged: 2020

Expert Engagement: PTAB Case No. IPR2021-00260

Type of Matter: Inter partes review

Case Name: PTAB IPR on U.S. Patent No. 9, 723,813 to Davis

Engaged on behalf of: Tomofun

Technology at Issue: Animal Interaction System

Services Provided: Wrote Declaration

Law Firm: Greenberg Traurig, LLP

Year Engaged: 2020

2019

Expert Engagement: Litigation

Type of Matter: Patent Investigation

Case Name: SIMO Holdings v Hong Kong uCloudlink Networks

Technology Limited and uCloudlink (America) LTD. CASE NO. 1:18-cv-05427 Southern District NY

Engaged on behalf of: uCloudlink Ltd
Technology at Issue: Wireless data links
Services Provided: Wrote Declarations
Law Firm: Fish & Richardson

Year Engaged: 2019

Expert Engagement: Litigation

Type of Matter: Patent Investigation

Case Name: Harris Corporation v. Huawei Device USA, Inc., et al.

Case No. 2:18-cv-439 ED-TX

Engaged on behalf of: Huawei Device USA Technology at Issue: Network Security

Services Provided: Wrote Declaration, Gave Deposition testimony

Law Firm: Ropes & Gray LLP

Year Engaged: 2019

Expert Engagement: Consulting
Type of Matter: Consulting

Case Name:

Engaged on behalf of: Photobucket

Technology at Issue: Photo distribution in wireless networks

Services Provided: Analysis of content distribution in wireless networks

Law Firm: Norton Rose

Year Engaged: 2019

Expert Engagement: Consulting

Type of Matter: Opinion regarding U.S. Pat. Application 2014/0192800,

Case Name:

Engaged on behalf of: SonicTube Research

Technology at Issue: Packetized wireless networks

Services Provided: Declaration

Law Firm: SonicTube Research

Year Engaged: 2019

2018

Expert Engagement: Inter Partes Review

Type of Matter: Patent Review

Case Number: IPR2017-00829, -00830, -01131, -01133

Engaged on behalf of: Vidstream LLC
Technology at Issue: Networked Video

Services Provided: Wrote Declaration, attended deposition

Law Firm: Norton Rose

Year Engaged: 2018

Expert Engagement: Litigation

Type of Matter: Patent Investigation

Case Name: Arista Networks, Inc. v. Cisco Systems, Inc. No. 5:16-CV-

00923-BLF (N.D. Cal.)

Engaged on behalf of: Arista Networks
Technology at Issue: Network protocols
Services Provided: Signed Declaration
Law Firm: Tensegrity Law Group

Year Engaged: 2018

Expert Engagement: Litigation

Type of Matter: Patent Investigation

Case Name: Intellectual Ventures I LLC v. HCC Insurance Holdings Inc.

CA No. 6:15-cv-00660 ED-TX

Engaged on behalf of: HCC Insurance Holdings

Technology at Issue: Back end web site technology

Services Provided: Wrote expert report, attended deposition

Law Firm: Norton Rose Fulbright

Disposition: Settled Year Engaged: 2018

2017

Expert Engagement: Inter Partes Review

Type of Matter: Patent Review
Case Number: IPR2018-00287

Engaged on behalf of: Comtech Mobile Datacom Corporation

Technology at Issue: Vehicle Mapping Technology

Services Provided: Wrote Declaration
Law Firm: Perkins Coie LLP

Year Engaged: 2017

Expert Engagement: ITC Matter

Type of Matter: Patent Investigation

Case Name: ITC Inv.No.337-TA-1057 Certain Robotic Vacuum Cleaning

Devices and Components Thereof

Such as Spare Parts,

Engaged on behalf of: Shenzhen Silver Star Intelligent Technology

Technology at Issue: Autonomous Vehicle Technology

Services Provided: Wrote expert report, gave deposition and hearing testimony

Law Firm: Pillsbury Winthrop Shaw Pittman

Year Engaged: 2017

2016

Expert Engagement: Litigation and Inter Partes Review

Type of Matter: Patent Investigation

Case Name: International Business Machines Corp. v. The Priceline

Group Inc., et al C.A. No. 15-137-LPS, and IPR2016-00608

and IPR2016-00609.

Engaged on behalf of: The Priceline Group Inc.
Technology at Issue: Web site Technology

Services Provided: Wrote Expert Reports on Invalidity and Non-infringement.

Attended Deposition.

Law Firm: Norton Rose Fulbright

Year Engaged: 2016

Expert Engagement: Litigation

Type of Matter: Patent Investigation

Case Name: Evolv, LLC v. Joyetech USA, Inc.

Case No. 8:16-cv-00459-CJC-JCG CD-CA

Engaged on behalf of: Joytech USA

Technology at Issue: Computer controlled voltage source

Services Provided: Wrote Declaration

Law Firm: Pillsbury Winthrop Shaw Pittman LLP

Disposition: Settled Year Engaged: 2016

Expert Engagement: Inter Partes Review

Type of Matter: Patent Review
Case Number: IPR2016-01431

Engaged on behalf of: HCC Insurance Holdings

Technology at Issue: Web site design; Network Agent Technology

Services Provided: Wrote Declarations for IPR

Law Firm: Norton Rose Fulbright

Disposition: Settled Year Engaged: 2016