



Michael L. Silver

Patent Technical Specialist

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OVERVIEW

Michael Silver is a patent technical specialist and a member of the IP Procurement and Portfolio Management practice group. Michael has experience in patent application drafting and prosecution in a wide array of technology areas including machine learning, AI, quantum computing, quantum sensing, quantum communications, circuits, semiconductor devices, device fabrication, particle accelerators, nuclear reactors and systems, machine vision, LIDAR, radiation therapy, dosimetry, surgical devices, medical devices, ultrasound devices, imaging systems, satellites, digital apps, optics, and photonics. He has extensive experience working with inventors and clients to develop patent prosecution strategies and perform portfolio management. Michael's practice regularly includes conducting inventor interviews and client discussion, drafting claims and patent applications, responding to office actions, performing searches, conducting freedom to operate analyses, performing patentability analyses, and advising clients on prosecution strategies.

PROFESSIONAL BACKGROUND

Prior to joining the firm, Michael was a technical specialist and patent engineer at a Chicago-based patent and intellectual property firm. Before entering the legal field, Michael worked building quantum information and sensing systems for various government entities for a decade. During this time, he also obtained his Ph.D. in Electrical Engineering from Northwestern University, specifically focused on quantum sensing, quantum computing, and photonics.

OTHER INFORMATION

Patents

- (Smith, Kevin H.; Visone, Christopher P.; Glasser, Ryan T.; Silver, Michael L.; Burberry, Lee M.; Wasilousky, Peter A.; "Optical sensing system with a phase sensitive amplifier and associated methods", U.S. Patent No. 8,912,475, December 16th, 201

EDUCATION

- Ph.D., Northwestern University, 2018
- B.S., Duke University, 2009

OTHER PUBLICATIONS

- Spectrally Multiplexed Upconversion Detection With C-Band Pump and Signal Wavelengths. Michael Silver, Paritosh Manurkar, Yu-ping Huang, Carsten Langrock, Martin M. Fejer, Prem Kumar, Gregory S. Kanter. IEEE Photonics Technology Letters, 2017, 29(13), 1097-1100.
- Multidimensional mode-separable frequency conversion for high-speed quantum communication. Paritosh Manurkar, Nitin Jain, Michael Silver, Yu-Ping Huang, Carsten Langrock, Martin M. Fejer, Prem Kumar, Gregory S. Kanter. Optica, 2016, 3(12), 1300-1307.
- Quantum optical arbitrary waveform manipulation and measurement in real time. Abijith S. Kowligy, Paritosh Manurkar, Neil V. Corzo, Vesselin G. Velez, Michael Silver, Ryan P. Scott, S. J. B. Yoo, Prem Kumar, Gregory S. Kanter, and Yu-Ping Huang. Optics Express, 2014, 22(23), 27942-27957.
- Quantum enhancement of a coherent ladar receiver using phase-sensitive amplification. P. Wasilousky, Kevin Smith, Ryan Glasser, Geoffrey L. Burdge, Lee Burberry, Bill Deibner, Michael Silver, et. al. Proc. Of SPIE, 2011, 8163, 816305-01/816305-11.

AREAS OF FOCUS

- IP Procurement and Portfolio Management