

Curriculum Vitae

Boris Murmann

May 31, 2017

Boris Murmann is a **Professor of Electrical Engineering at Stanford University**. He joined Stanford in 2004 after completing his Ph.D. degree in electrical engineering at the University of California, Berkeley in 2003. He is a Fellow of the IEEE.

EMPLOMENT

1994 to 1997: he was with Neutron Microelectronics, Germany, where he developed low-power and smart-power ASICs in automotive CMOS technology.

2004-2007: he has worked as a consultant with numerous Silicon Valley companies.

Dr. Murmann's research interests are in mixed-signal integrated circuit design, with special emphasis on sensor interfaces, data converters and custom circuits for statistical inference.

AWARDS & PROFESSIONAL COMMITTEES

2008 he was a co-recipient of the Best Student Paper Award at the VLSI Circuits Symposium and a recipient of the Best Invited Paper Award at the IEEE Custom Integrated Circuits Conference (CICC). He received the Agilent Early Career Professor Award in 2009 and the Friedrich Wilhelm Bessel Research Award in 2012. He has served as an Associate Editor of the IEEE Journal of Solid-State Circuits, as well as the Data Converter Subcommittee Chair and the Technical Program Chair of the IEEE International Solid-State Circuits Conference (ISSCC). He is also a Fellow of the IEEE.

PATENTS

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2. B. Murmann and Y. Oh, "Arrangements and methods for providing compensation for non-idealities of components in communications systems," US 8290031, Oct. 16, 2012. [\[141\]](#)

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- 2 2017 [D. Adams, Y.C. Eldar and B. Murmann, "A Mixer Frontend for a Four-Channel Modulated Wideband Converter with 62 dB Blocker Rejection," to appear, IEEE J. Solid-State Circuits. \[2\]](#)
- 3 2017 E. Lee, D. Miyashita, E. Chai, B. Murmann, S. Wong, "LogNet: Energy-efficient Neural Networks using Logarithmic Computation," to appear at ICASSP 2017.
- 4 2017 L. Yang and B. Murmann, "SRAM Voltage Scaling for Energy-Efficient Convolutional Neural Networks," ISQED 2017.
- 5 2017 [M-C. Chen, A. Peña Perez, S-R. Kothapalli, P. Cathelin, A. Cathelin, S.S. Gambhir, and B. Murmann, "A Pixel-Pitch-Matched Ultrasound Receiver for 3D Photoacoustic Imaging with Integrated Delta-Sigma Beamformer in 28nm UTBB FDSOI," ISSCC Dig. Tech. Papers, San Francisco, CA, Feb. 2017, pp. 456-457. \[3\]](#)
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- 8 2016 [C. Gupta, Aldo Peña Perez, S.R. Fischer, S.B. Weinreich, B. Murmann, and R.T. Howe, "Active control of probability amplitudes in a mesoscale system via feedback-induced suppression of dissipation and noise," Journal of Applied Physics, vol. 120, no. 22, Dec. 2016. \[6\]](#)

- 9 2016 [D. Bankman and B. Murmann, "An 8-Bit, 16 Input, 3.2 pJ/op Switched-Capacitor Dot Product Circuit in 28-nm FDSOI CMOS," Proc. IEEE Asian Solid-State Circuits Conf., Toyama, Japan, Nov. 2016, pp. 21-24. \[7\]](#)

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- 11 2016 [D. Robertson, A. Buchwald, M. Flynn, Hae-Seung Lee, Un-Ku Moon, and B. Murmann, "Data Converter Reflections: 19 Papers from the Last Ten Years That Deserve a Second Look," Proc. ESSCIRC, Lausanne, Switzerland, Sep. 2016, pp. 161-164. \[9\]](#)

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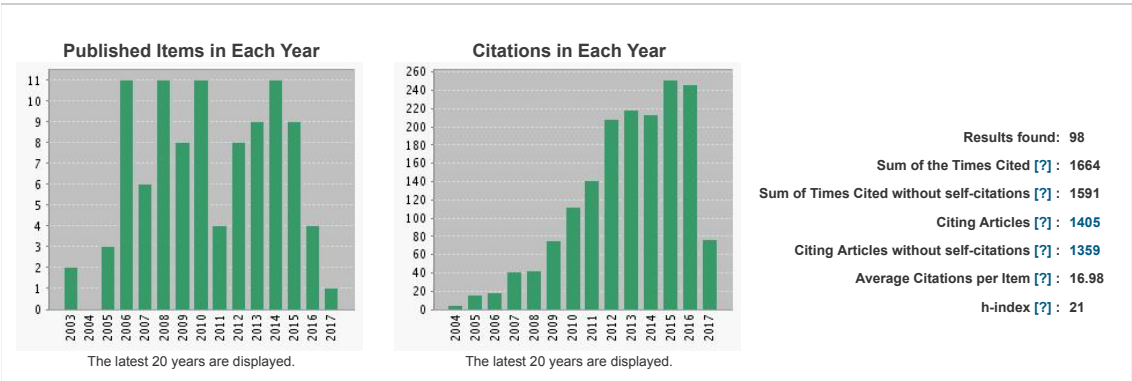


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