

Papers Published

Papers Published by Dr. D.Sundararajan

Computation of the discrete Fourier Transform

*IEEE Trans. Cir. and Sys. II, vol. CAS-45,
No.4, pp.449-461, April, 1998.
Co-author with M. O. Ahmad*

Fast Computation of the discrete Fourier Transform of Real Data

*IEEE Trans. Signal Processing, vol. 45, No. 8,
Aug. 1997, pp. 2010-2022.
Co-author with M. O. Ahmad*

A Fast Bit-Reversal Algorithm

*IEEE Trans. Cir. and Sys. II, vol. 41, No. 10,
Oct. 1994, pp. 701-703.
Co-author with M. O. Ahmad*

Fast Computation of the discrete Walsh and Hadamard Transforms

*IEEE Trans. Image Processing, vol.7, No.6, pp. 898-904
June, 1998.
Co-author with M. O. Ahmad*

Index Mapping Approach of Deriving the PM DFT algorithms

*IEEE Trans. Computers, vol. 47, No. 12, Dec. 1998,
pp. 1418-1424.
Co-author with M. O. Ahmad*

Fast Computation of the discrete Walsh Transform

*Proc. of the 39th Midwest Symp. on Cir. and Sys.,
Aug. 1996, Ames, Iowa, pp. 785-788.
Co-author with M. O. Ahmad*

Efficient Computation of the DFT for Some Transform lengths that are not Integral Powers of Two

*Proc. of the 39th Midwest Symp. on Cir. and Sys.,
Aug. 1996, Ames, Iowa, pp. 777-780.
Co-author with M. O. Ahmad*

Fast Computation of the Two-Dimensional Discrete Fourier Transform

*Proc. of the 39th Midwest Symp. on Cir. and Sys., Aug.
1996, Ames, Iowa, pp. 777-780.
Co-author with M. O. Ahmad*

Matrix Factorization Derivation and Analysis of Computational Complexity of a New Radix-2 DFT Algorithm

*Proc. of the 39th Midwest Symp. on Cir. and Sys.,
Aug. 1996, Ames, Iowa, pp. 763-766.
Co-author with M. O. Ahmad*

Index Mapping Approach of Deriving the PM DFT Algorithms

*Proc. of the Canadian Conf. on Elec. and Comm. Engg.,
1995, Montreal, Canada, pp. 886-889.
Co-author with M. O. Ahmad*

Projects

- Naveen B N has carried out a Research Project on "SIMULATION OF DSP BASED COMMUNICATION RECEIVERS" in MVJCE, Bangalore
- Suhas A R has carried out a Research Project on "WIRELESS NETWORK FOR FUTURE WARFARE FLIGHT DATA RECORDER" in ADA, Bangalore

Faculty Achievements

Books Published by Dr. Sundararajan

The Discrete Fourier Transform

World Scientific Publishing Co. Pte. Ltd, Singapore, 2001.

Digital Signal Processing Theory & Practice

World Scientific Publishing CO. Pte. Ltd, Singapore, 2003.

A Practical Approach to Signals and Systems

John Wiley & Sons (Asia) Pte Lte, Singapore, 2008.

**Dr. D. Sundararajan Fundamentals of the DFT (fft)
Algorithms**

ISBN 981 02 4521 1. World Scientific, 2001.

November 9, 2009.

ON-LINE WRITER for dsprelated.com

www.dsprelated.com/showabstract/113.php

www.dsprelated.com/showabstract/93.php

Patents & Innovations

Patents by Dr. Sundararajan

Computational Structures for Fast Fourier Transform Analyzers

U.S. Patent, No. 5,371,696

Dec. 1994

with M. O. Ahmad

FFT Butterfly Arithmetic Units

British Patent, No. GB 2,283,592,

Oct. 1998.

with M. O. Ahmad, M. N. S. Swamy

Computational Structures for Fast Fourier Transform Analyzers

Canadian Patent, No. 2,086,174,

Aug. 1998.

with M. O. Ahmad, M. N. S. Swamy