

# Research Publications by Faculty Members in 2011

## Journals

1. Dhara, Basudeb; De Filippis, Vincenzo; Sharma, Rajendra K. Generalized derivations and left multipliers on Lie ideals. *Aequationes Math.* 81 (2011), no. 3, 251-261.
2. Singh Yadav, Dharendra; Sharma, R. K.; Shukla, Wagish On quadratic reducibles and irreducibles over  $F_p$ . *Int. J. Math. Sci. Appl.* 1 (2011), no. 2, 785-789.
3. R. K. Sharma, Wagish Shukla, S. Ramaswamy, On Trace and Structure of  $F_{2^n}$ . *J. Communication Computer*, Vol. 8, (2011), pp 329-334.
4. Dharendra Singh Yadav , R. K. Sharma and Wagish Shukla; A Note on Trace map, *Int.J. of Algebra*, Vol. 5, 2011, no. 24, 1175 - 1179.
5. Bipin Kumar Tripathi, B. Chandra, Menakshi Singh, Prem Kumar Kalra: Complex generalized-mean neuron model and its applications. *Appl. Soft Comput.* 11(1): 768-777 (2011).
6. B. Chandra, Shalini Bhaskar: A new approach for generating efficient sample from market basket data. *Expert Syst. Appl.* 38(3): 1321-1325 (2011).
7. B. Chandra, Manish Gupta: An efficient statistical feature selection approach for classification of gene expression data. *Journal of Biomedical Informatics* 44(4): 529-535 (2011).
8. B. S. Panda, Preeti Goel:  $L(2, 1)$ -labeling of perfect elimination bipartite graphs. *Discrete Applied Mathematics* 159(16): 1878-1888 (2011).
9. B. S. Kaur, I. Schindler and K. Sreenadh: On uniform estimates and global multiplicity of positive solutions for a quasilinear elliptic equation, *Advances in Mathematical Sciences and Applications*, Vol. 21, (2011), 133-154.
10. Reshma Khemchandani, Anuj Karpatne, Suresh Chandra: Generalized eigenvalue proximal support vector regressor. *Expert Syst. Appl.* 38(10): 13136-13142 (2011).
11. Mittul Singh, Jivitej Chadha, Puneet Ahuja, Jayadeva, Suresh Chandra: Reduced twin support vector regression. *Neurocomputing* 74(9): 1474-1477 (2011).
12. Dipti Dubey and Aparna Mehra, Linear programming with Triangular Intuitionistic Fuzzy Numbers, *EUSFLAT-LFA 2011, Advances in Intelligent Systems Research*, Atlantis Press, 1(1), 2011, 563 - 569.
13. Anulekha Dhara and Aparna Mehra, Metric Regularity and Optimality Conditions in Nonsmooth Optimization, *Topics in Nonconvex Optimization: Theory and Applications*, Optimization and Its Applications, 50, 2011, 101-114.

14. Anjana Gupta, Aparna Mehra, Davinder Bhatia: Characterizing strict efficiency for convex multiobjective programming problems. *J. Global Optimization* 49(2): 265-280 (2011).
15. Vandana Gupta and S. Dharmaraja: Semi-Markov modeling of VoIP dependability in the presence of resource degradation and security attacks, *Reliability Engineering and System Safety*, 96 (2011) pp. 1627 - 1636.
16. V. Arunachalam, L. Blanco and S. Dharmaraja: A Stochastic Model For The Pricing Of Options With Volatility Jumps, *International Journal of Financial Markets and Derivatives*, 2 (2011) pp. 223 - 235.
17. Vaneeta Jindal, S. Dharmaraja and Kishor S Trivedi: Markov Modeling Approach for Survivability Analysis of Cellular Networks, *International Journal of Performability Engineering*, 7 (2011) pp. 429 - 440.
18. Vandana Gupta, Mingwei Gong, S. Dharmaraja and Carey Williamson: Analytical Modeling of Bidirectional Multi-channel IEEE 802.11 MAC Protocols, *International Journal of Communication Systems*, 24 (2011) pp. 647-665.
19. Vandana Gupta, S. Dharmaraja and Mingwei Gong: Analytical Modeling of TCP Flow in Wireless LANs, *Mathematical and Computer Modelling*, 53 (2011) pp. 684 - 693.
20. S. C. S. Rao, S. Kumar, M. Kumar: Uniform Global Convergence of a Hybrid Scheme for Singularly Perturbed Reaction-Diffusion Systems. *J. Optimization Theory and Applications* 151(2): 338-352 (2011).
21. Nagar, Anima; Sharma, Puneet Combined dynamics on hyperspaces. *Topology Proc.* 38 (2011), 399-410.
22. Niladri Chatterjee and Renu Balyan, Towards Development of a Suitable Evaluation Metric for English to Hindi Machine Translation, *International Journal of Translation* Vol 23, No. 1, pp 7 - 26, 2011.
23. Pandey, Ram Krishna; Tripathi, Amitabha On the density of integral sets with missing differences from sets related to arithmetic progressions. *J. Number Theory* 131 (2011), no. 4, 634-647.
24. Pandey, Ram Krishna; Tripathi, Amitabha On the density of integral sets with missing differences from sets related to arithmetic progressions. *J. Number Theory* 131 (2011), no. 4, 634-647.

## **Conference Proceedings**

1. B. Chandra, Shalini Bhaskar: A novel approach of finding frequent itemsets in high speed data streams. *FSKD 2011*: 40-44.
2. B. Chandra, Shalini Bhaskar: Patterned Growth algorithm using Hub-Averaging without pre-assigned weights. *SMC 2011*: 3518-3523.
3. B. Chandra, Venkatanaresb babu Kuppili: Heterogeneous node split measure

for decision tree construction. SMC 2011: 872-877.

4. Sameena Shah, Jayadeva, Ravi Kothari, Suresh Chandra: M-Unit EigenAnt: An Ant Algorithm to Find the M Best Solutions. AAAI 2011, electronic edition.

5. Dharendra Singh Yadav, Rajendra Kumar Sharma, Wagish Shukla, On Applications of Singular Matrices over Finite Fields in Cryptography. InfoSecHiComNet 2011: 181-185.

6. B. S. Panda, D. Pushparaj Shetty: An Incremental Power Greedy Heuristic for Strong Minimum Energy Topology in Wireless Sensor Networks. ICDCIT 2011: 187-196.

7. Niladri Chatterjee and Pramod K. Sahoo, Near-Orthogonality of Random Index Vectors and Its Effect on Extractive Text Summarization. Proc. Indian National. Sci. Acad (INSA), Volume 77 No. 2, (Spl. Issue) , pp. 207-218, June, 2011.

8. Niladri Chatterjee and Renu Balyan, English to Bangla Machine Translation: Towards Developing a suitable Evaluation Metric. Proc. ICCPB-2011, Independent University, Bangladesh, pp 5 - 9, 2011.

9. S. Kundu, A. Sreedhar: Modeling manufacturing process variation for design and test. DATE 2011: 1147-1152.

10. A. Sreedhar, S. Kundu: Physically unclonable functions for embeded security based on lithographic variation. DATE 2011: 1632-1637.

11. M. Buttrick, S. Kundu: On testing prebond dies with incomplete clock networks in a 3D IC using DLLs. DATE 2011: 1418-1423.