

Bibliography

- [1] Maswood, A.I.; Shen Wei, *Harmonic propagation in high power converter under unbalanced and distorted input voltages*, Power Engineering Society General meeting 2003, IEEE, 1491
- [2] Yue Wang, Zhaoan Wang, Jun Yang, Jinjun Liu, Zhiping Fu, Yong Duan and Yahan Hua, *A Novel Comprehensive Compensator for Electrified Railway System*, IEEE Annual Power Electronics Specialist Conference, 3, 2003, 1032 -1037.
- [3] D.A. Deib and H.W. Hill, *Optimal Firing-Angle Control of Cascaded HVDC Converters for Minimum Reactive Power Demand*, , Proceedings of the IECON, 1993, 15-19
- [4] W. Mc Murray,, *A Study of Asymmetrical Gating Phase Controlled Converters* IEEE Transactions on Industry Applications, 8(3), 1972, 289-295
- [5] S. Bhattacharya, B. Bannerjee, D. Diwan, *Active filter solutions for utility interface*, Proceedings of ISIE 95, July 1995, Vol.1, pp.10-14
- [6] S. Bhattacharya, P. Cheng, D. Diwan, *Hybrid solutions for improving passive filter performance in high power applications*, IEEE Transaction on industrial Application, Vol 33, No. 3, May 1997, pp.732-747
- [7] Mahesh Sitaram, K. R . PAdiyar, V. Ramanarayan, *Digital Simulation of a hybrid active filter, an active filter in series with shunt passive filter*, IEEE PES meeting on Power Quality, 1998. pp.65-71.
- [8] C.L. Chen, C.E. Lin, C.L Huang, *The reference active source current for active power filter in an unbalanced three-phase power system via the synchronous detection method*, IMTC94. Conference Proceedings, May 1994, vol.2, pp.502 -505

- [9] Duro Basic, Victor S Ramsden, and Peeter K. Muttik *Harmonic Filtering of High Power 12 - pulse Rectifier Loads with a selective Hybrid filter system*, IEEE Transaction on Industrial Electronics, vol 48, No. 6, Dec 2001
- [10] J.C.Das, PE, *Passive Filters - Potentialities and Limitations*, IEEE Transaction on Industry Application, Jan-Feb 2004, 232 - 241.
- [11] Dahono P.A, *New hysteresis current controller for single-phase bridge inverters*, IET journal on Power electronics, vol.2 (2009):pp. 585-594.
- [12] Hongyu Li., Fang Zhuo, Zhaoan Wang, Lei W. and Wu L., *A novel time domain current detection algorithm for shunt active power filters*, IEEE Trans. power systems, vol.20, (2005):pp. 644-651.
- [13] B.O. Slim, Braha A. and Ben saoud s, *Hardware design and Implementation of digital controller for Parallel Active Filters*, IEEE Conf. Design and test of integrated systems in nanoscale technology, (2006): pp. 331-334.
- [14] Y.F.Chan, Moallem M., and Wei Wang, *Design and implementation of modular FPGA-based PID controllers*, IEEE Trans. Indus. Elect. vol. 54, (2007):pp. 1898-1906.
- [15] Ching-Tsai Pan and Ting-Yu Chang, *An Improved hysteresis current controller for reducing switching frequency*, IEEE Trans. Power Electronics, vol. 9, (1994): pp.97-104.
- [16] Angelo Baghini, *Hand book of power quality*, John Wiley and Sons, Lt
- [17] M.J. Newman, D.N.Zmood and D.G. Homes, *Stationary frame harmonic reference generation for active filters systems*, IEEE Applied Power Electronics Conference (APEC 2002) , pp. 1054 - 1060, 2002
- [18] Bhattacharya S., Divan, and B. Benejee, *Synchronous Reference Frame Harmonic Isolator Using Series Active Filter*, 4th European Power Electronic Conf., Florence, Vol. 3, (1991):pp. 30-35.
- [19] Kale M. and Ozdemir E., *An adaptive hysteresis band current controller for shunt active power filter*, Electrical power sys. Research. Vol.73, (2005): pp.113-119.

- [20] Zeliang Shu, Yuhun Guo, Jisan Lian, *Steady state and dynamic study of active power filter with efficient FPGA based control algorithm* , IEEE Transaction Industrial Electronics, vol. 55, (2008),pp. 1527-1536.
- [21] B.K. Bose, *An adaptive hysteresis band current control technique of a voltage feed PWM inverter for machine drive system*, IEEE Trans. Ind. Electron. vol.37, (1990):pp. 402-406.
- [22] Narain G. Hingorani, Laszlo Gyugyi, *Understanding FACTS*, A John Wiley & Sons, Inc., Publication.
- [23] H. Farahmand, Rasid-Nejad and M. Fotuhi-Firozabad, *Implement of FACTS Devices for ATC Enhancement Using RPF techniques* , IEEE ,2004, pp 30-35
- [24] Linzhong Yao, Phill Cartwright. Laurent Schimitt, Xiao-Ping Zhang, *Congestion Management of Transmission System Usin FACTS* , IEEE/PES transmission and Distribution conference and exhibition: Asia and Pacific Dalian, China, 2005
- [25] Naresh Acharya, N. Mithulananthan, *Locating Series FACTS devices for congestion management in deregulated electricity markets*, Electric Power system Research 2332 (2006), pp 1-9.
- [26] Hirofumi Akagi, Edson Hirokazu Watanabe, Mauricio Aredes , *Instantaneous power theory and applications to power conditioning* , A John Wiley & Sons, Inc., Publication.
- [27] Kim Y.S., Kim, J.S., Ko S.H., *Three-phase Three-wire series active power filter, which compensates for harmonics and reactive power*, IET Journals, Electric Power Applications, Vol.151, (2004):pp.276-282.
- [28] Hafner J., Aredes M., Heumann K., *A shunt active power filter applied to high voltage distribution lines* ,IEEE Trans. Power delivery, Vol.12, (1997):pp.266-272.
- [29] Sangsun Kim, Enjeti P.N, *A new hybrid active power filters (APF) topology* , IEEE Trans. Power Electronics, vol.17, (2002):pp.48-58.
- [30] N.G. Hingorani, *Flexible A.C. transmission*, IEEE spectrum, April 1993, pp 40-45

- [31] Grino, R., Cardoner R., Costa-Castello R., Fossas E, *Digital repetitive control of a Three- phase four-wire shunt active filter*, IEEE Trans. Industrial Electronics, Vol. 54, (2007):pp.1495-1503.
- [32] Karuppanan P., Mahapatra K.K., ***A new hybrid active power filters (APF) topology*** , IEEE Conference, IICPT, Power Electronics, (2011):pp.1-6.
- [33] V. S. C. Raviraj and P. C. Sen, *Comparative Study of Proportional-Integral, Sliding Mode, and Fuzzy Logic Controllers for Power Converters*, IEEE Trans. Industry Applications, Vol. 33, (1997):pp. 518-524.
- [34] C. N. Bhende, S. Mishra, and S. K. Jain, *TS-Fuzzy-Controlled Active Power Filter for Load "Compensation*, IEEE Trans. Power Delivery, Vol. 21, (2006):pp. 1459-1465.
- [35] Vaibhav Purwar, Sanjiv Kr, *Simulation of Shunt Active Power Line Conditioner (APLC) for Three Phase AC/DC Converter*, VSRD-IJEECE, Vol. 1 (9), 2011, 504-513.
- [36] L R Limongi, M C Cavalcanti, F A S Neves, G M S Azevedo., *Implementation of a Digital signal processor controlled shunt active filter*, Electrical power quality and utilisation journal Vol. XII no.2, 2006, pp no. 5 to 14.
- [37] Mehmet Ucar, Sule Ozdemir, Engin Ozdemir, *A four-leg unified series-parallel active filter system for periodic and non-periodic disturbance compensation*, Department of Electrical Education, Technical Education Faculty, Kocaeli University, Umuttepe Kampus, Izmit 41380, Kocaeli, Turkey. Electric Power Systems Research 81 (2011) 1132-1143.
- [38] Ying Xiao, Y.H. Song, Chen-Ching Liu and Y.Z. Sun, *Available Transfer Capability Enhancement using FACTS Devices* , IEEE transaction on power system, vol-18, No.1 pp 305 to 312 , February 2003
- [39] H. Akagi, Y. Kanazawa, and A. Nabae,, *Generalized theory of the instantaneous reactive power in three phase circuits*,, Proc. JIEE IPEC-Tokyo, 1983.
- [40] H.L. Jou, *Performance comparison of the three-phase active-power-filter algorithms*, IEE Proceedings, Generation, Transmission and Distribution, Vol.142, pp. 646 -652

- [41] Bennell, F.T., *Current equalizing transformer for current balance in parallel-connected 12-pulse converter*, Electric Power Applications, IEE Proceedings B, 135(2), 1988, 85 - 90
- [42] Rajagopalan, V., *Modeling and simulation of power electronic converters for power supplies*, Proceedings of the 1995 IEEE IECON 21st International Conference on 1995:27 - 32
- [43] Paice, D.A.;R.J, *Calculating and controlling harmonics caused by power converters*, Industry Applications Society Annuan Meeting, 1989, 456 -463
- [44] D.A.Deib and H.W.Hill, *Optimal Firing Angle Control of Cascaded HVDC converters for Minimum Reactive power Demand*, Proceeding of the IECON, 1993, 15-19
- [45] W. Mc. Murray, *A Study of Asymmetrical Gating Phase Controlled Converters*, IEEE Transaction on Industry Applications 8(3), 1972, 289 - 295
- [46] H. Akagi, *Trends in Active Power Line Conditioners*, IEEE Transaction on Power Electronics, Vol.9, no.3, May 1994, 263-268.
- [47] Fang Zheng Peng, *Application Issues of Active power filters*, Industry Application magazine, IEEE vol. 4 ,Sept. 1998, 21 - 30
- [48] F. Z. Peng, H. Akagi, and A. Nabae, *A new approach to harmonic compensation in power systemsA combined system of shunt passive and series active filter*,IEEE Trans. Ind. Applicat., vol. 26, pp. 983990, Nov./Dec. 1990.
- [49] H. Fujita and H. Akagi,, *A practical approach to harmonic compensation in power systemsSeries connection of passive and active filters*, , IEEE Trans. Ind. Applicat., vol. 27, pp. 10201025, Nov./Dec. 1991.
- [50] P. T. Cheng, S. Bhattacharya, and D. M. Divan, *Application of dominant harmonic active filter system with 12 pulse nonlinear loads*, , IEEE Trans. Power Delivery, vol. 14, pp. 642647, Apr. 1999.
- [51] D. Basic, V. S. Ramsden, and P. Muttik, *Digital implementation of the synchronous reference frame controller for a selective hybrid filter control system*,, Proc. AU-PEC/EECON99, Sept. 1999, pp. 473478.

- [52] D. Basic, V. S. Ramsden, and P. K. Muttik, *Hybrid filter control system with adaptive filters for selective elimination of harmonics and interharmonics*, Proc. IEE-Elect. Power Applicat., vol. 147, no. 4, pp. 295-303, July 2000.
- [53] S. Hansen, P. Nielsen, F. Blaabjerg, *Harmonic Cancellation by Mixing Non Linear single phase and Three Phase Loads*, IEEE Transactions, Vol. 36 No.1, 2000, pp. 152-159.
- [54] M. Grotzback, T. Strasser, L. Lorenz, *Line Side Harmonics Of Three Phase current controlled Rectifiers in continuous and discontinuous operation mode*, Proc. of EPE conf. 1993, pp. 707-712.
- [55] Singh B.N., Bhim Singh, Chandra A, Al-Haddad.K, *Digital Implementation of A new type of Hybrid filter with simplified control strategy*, Applied Power Electronic conference and Exposition, 1999 .APEC 99. 14th Annual, Vol. 1, 14-18 March, 1999.
- [56] Bor-Ren Lin, Chun-Hao Huang, Bor-Ren Yang, *Control scheme of Hybrid Active Filter for Power Quality Improvement*, Industrial Technology, 2002. IEEE ICIT 02, 2002 pp 317-322 vol.1.
- [57] Saitou. M, Shimizu. T, *A novel strategy of the high power PWM inverter with the series active filter*, Industrial Electronics 2000, ISIE 2000, Proceedings of the 2000 IEEE International Symposium on, vol.1, 4-8 Dec. 2000, 67-72.
- [58] T.C. Green and J.H. Marks, *Issues in the Rating of Active Power Filters*, IEE Proc. Electric Power Applications, Vol. 150, No. 5, pp. 607 - 614, 2003.
- [59] S.T. Senini and P.J. Wolfs, *Systematic Identification and review of hybrid active filter topologies*, IEEE Power Elec. Specialist Conf., pp. 394 - 399, 2002.
- [60] M. El - Habrouk, M.K. Darwish and P. Mehta, *Active power filters: a review*, IEE Proc. EPA, Vol. 147, No. 5, pp. 403 - 413, 2000.
- [61] S. Rechka, E. Ngandui, J. Xu and P. Sicard, *A comparative study of harmonic detection algorithms for active filter and hybrid active filters*, IEEE Power Elec. Specialist Conf., pp. 357 - 363, 2002

- [62] S. Mariethoz and A.C. Rufer, *Open loop and closed loop spectral frequency active filtering*, IEEE Power Elec. Specialist Conf., pp. 357 - 363, 2002.
- [63] S. Rechka, E. Ngandui, J.Xu and P. Sicard, *A comparative study of harmonic detection algorithms for active filter and hybrid active filters*, IEEE Power Elec. Specialist Conf., pp. 357 - 363, 2002.
- [64] H. Rudnick, J. Dixon and L. Morn, *Delivering clean and pure power*, IEEE Power & Energy Magazine, Sept./Oct. pp. 32 - 40, 2003.
- [65] F.Z. Peng, L.M. Tolbert and Z. Qian, *Definitions and compensation of non -active current in power systems*, IEEE Power Electronics Specialist Conference (PESC 02), Cairns, Australia, pp. 1779 - 1784, June 2002.
- [66] M.J. Newman, D.N.Zmood and D.G. Homes, *Stationary frame harmonic reference generation for active filters systems*, IEEE Applied Power Electronics Conference (APEC 2002) , pp. 1054 - 1060, 2002
- [67] P. Mattavelli, P.Tenti , *High performance active filters using selective harmonic control* , IEEE Power Engineering Society Summer Meeting, pp. 977 -982 , 2000.
- [68] Richard M. Duke and Simon D. Round , *The steady-state performance of a controlled current active filter*, IEEE Trans. Power Electronics, Vol. 8, No. 3, April 1993, pp 140.
- [69] V.B. Bhavaraju and Prasad N. Enjeti, *Analysis and design of an active power filter for balancing unbalanced loads*, IEEE Trans. Power Electronics, Vol. 8, No. 4 October 1993, pp 640.
- [70] Wei P, Zhan Z, Chen H , *A DSP-based active power filter for three phase power distribution systems* , Proc ICCET 1: pp. 210-214, 2009.
- [71] Wei L, Guskov N, Lukaszewski RA, Skibinski G , *Mitigation of current harmonics for multi-pulse diode front end rectifier systems*, In Conf Rec 14th IEEE IAS Ann Meeting Oct. 2-6, 2005.
- [72] Hamad MS, Masoud MI, Finney SJ, Williams BW , *A new power locus for the p-q operation of series connected 12-pulse current source controlled converter*, Proc 39th IEEE PESC, Rhodes, Greece pp 2264-2270, 2008.

- [73] Ping W, Houquan C, Zhixiong Z , *Three-phase active power filter based on DSP for power distribution systems*, Proc APPEEC, pp. 1-5, 2009.
- [74] Kumar P.,Prakash P., *Harmonic Filter Design for HvdC Lines Using Matlab*, International Journal of Computational Engineering Research, Vol. 03, No.11, November 2013, p. 12-19.
- [75] Sanjib K.N., Ridown R.R., Siddikur R.Md , *Investigation of THD on a 12-pulse HVDC transmission network and mitigation of harmonic currents using passive filters*, IEEE 2nd International Conference on Proceedings of International Conference on Electrical Information and Communication Technology. 10-12 Dec. 2015, p. 510-515.
- [76] H. Akagi, K. Isozaki , *A Hybrid Active Filter for a Three-Phase 12-Pulse Diode Rectifier Used as the Front End of a Medium-Voltage Motor Drive*, IEEE Trans. Power Electron, vol. 27, no. 1, pp. 69 77, 2012.
- [77] M.S. Hamad, M.I. Masoud, B.W. Williams, and S. Finney, *Medium voltage 12-pulse converter: ac side compensation using a shunt active power filter in a novel front end transformer configuration*, IET Trans. Power Electron, vol. 5, no. 2, pp. 1315 1323, Sep. 2012.
- [78] M.S.Hamad, M.I.Masoud,B.W.Williams, *Medium-Voltage 12-pulse Converter: Output Voltage Harmonic Compensation using a Series APF*,IEEE Trans. Ind. Electron., vol. 61, no. 1, pp. 43 52, 2014.
- [79] M.Aredes, H.Akagi and E.H.Watanabe, *Comparisons Between the p-q and p-q-r Theories in ThreePhase Four-Wire Systems*, IEEE Trans. Power Electron, vol. 24, no. 4, pp. 924 933, April 2009.
- [80] Sumer Chand Prasad,D.K.Khatod, *A Review on Selection and Usage of Modern Active Power Filter*,International Journal of Engineering Trends and Technology (IJETT) Volume 20 Number 2 Feb 2015.
- [81] Hurng-Liahng ,Jou,Jinn-Chang Wu, Yao-Jen Chang, and Ya-Tsung Feng, *A Novel Active Power Filter for Harmonic Suppression*, IEEE Transactions on Power Delivery, Vol. 20, No. 2, April 2005.

- [82] J.Dixon,J.Espinoza,L.Moran and D.Rivas, *A simple control scheme for hybrid active power filter*,IEEE PESC, 2000, pp. 991996.
- [83] M.Routimo,M.Salo and H.Tuusa, *Comparison of voltage source and current-source shunt active power filters*,Conf. Rec. IEEE Power Electronics Specialists Conference (PESC), pp.25712577 (2005).
- [84] XIAOHU ZHANG ,LONGFU LUO,ZHIHAO NING,YANMEI LI, *A new 12-pulse Industry Rectifier system based on Inductive Filtering Technology*, U.P.B. Sci. Bull., Series C, Vol. 76, Iss. 3, 2014 ISSN 22863540.
- [85] Ohta M ,Fukuda S, *Twelve-pulse diode rectifier with reduced input current harmonics*,The Fifth International Conference on Power Electronics and Drive Systems, 2003, 1442-1447.
- [86] S.Srianthumrong, H.Fujita,and H.Akagi, *Stability analysis of a series active filter integrated with a double-series diode rectifier*, IEEE Trans. Power Electron.17 (1),117124 (2002).
- [87] A Hema Sekhar, A Lakshmi Devi, *A new filtering method and a novel converter tranformer for HVDC system*,International Journal of Conceptions on Electrical & Electronics Engineering Vol. 1, Issue. 2, December 2013; ISSN: 2345 9603.
- [88] J.Alan,C.Forresta,and B.Allard, *Thermal problems caused by harmonic frequency leakage fluxes in three-phase, three-winding converter transformers*, IEEE Trans. Power Del., vol. 19, no. 1, pp. 208213, Jan. 2004.
- [89] D.Rivas,L.Moran,J.W.Dixon,and J.R.Espinoza, *Improving passive filter compensation performance with active techniques*, IEEE Trans. Ind. Electron., vol. 50, no. 1, pp. 161170, Feb. 2003.
- [90] Mahendra Singh Rajput , Arun Pachori, *Performance Evaluation of DC Motor Using 12 Pulses Three phase Controlled Rectifier Assisted with Auxiliary Supply Voltage*, International Journal of Electrical and Electronics Research ISSN 2348-6988 (online) Vol. 2, Issue 4, pp: (152-159), Month: October - December 2014,

- [91] C.Rech and J.R.Pinheiro, *Line current harmonics reduction in multipulse connection of asymmetrically loaded rectifiers*, IEEE Trans. Ind. Electron., vol. 52, no. 3, pp. 640652, Jun. 2005.
- [92] Subramanian Muthu, *Analysis and control of Unified Active Power Filter*, Dissertation thesis, University of Victoria
- [93] Vinod Gupta, *Novel technique for improving power quality with voltage compensation and harmonic suppression*, Ph.D thesis, 2013.
- [94] T.Tanaka, N.Koshio, H.Akagi, and A.Nabae, *A novel method of reducing the supply current harmonics of a 12- pulse thyristor rectifier with an interface reactor*, Proc. IEEE Inst. Aeronaut. Sci. Annu. Meet, Oct. 1996, vol. 2, pp. 12561262.