

1. Title: ENERGY CONSERVATION IN ELECTRIC MOTORS USING AC AND DC DRIVES AND CONTROL OF DRIVES USING PLC. (UGC MRP F.NO.38-245/2009(SR) Dated 24/12/2009)

2. PI information : Dr.M.SARAVANAN, PROFESSOR,EEE DEPT., TCE

3. Project Duration and cost : 3 YEARS (2010-2013) & Rs.8,32,080- (Rupees Eight Lakhs Thirty Two Thousand and Eighty Rupees only)

4. Equipment purchased and usage:

SIEMENS DC DRIVE TRAINER KIT CONSISTING OF SIEMENS DC DRIVE, 5 kW DC MOTOR, 5kW DC GENERATOR and SIEMENS PLC.

The equipment is used for doing research in DC drive by Ph.D. Scholars and for doing experiments in DC drive by Post graduate students.

5. Publications:

International Journals:

- D. Prince Winston, M. Saravanan, “Novel Energy Conservation Scheme for Three Phase Induction Motor Drives Employed in Constant Speed Applications” Prz Elektrotechniczn (Electrical Review), Vol. 88, No.11a, pp. 243-247, 2012.
- D. Prince Winston, M. Saravanan, “A Modified Energy Conservation Circuit for Chopper fed DC Motor Drive” Prz Elektrotechniczn (Electrical Review), Vol. 88, No.12a, pp. 295-296, 2012.
- D. Prince Winston, M. Saravanan and S.Arockia Edwin Xavier, “A new power factor correction approach for cost and energy saving in industrial motor drives” International Review on Modelling and Simulation (IREMOS), Vol -4, No-6, pp-2919 – 2925, December- 2011.

International Conference:

D. Prince Winston, M. Saravanan and S.Arockia Edwin Xavier, “Neural Network Based New Energy Conservation Scheme for Three Phase Induction Motor Operating Under Varying Load Torques” IEEE International Conference, PACC 2011, 20-22 July 2011.

6. PhD/ ME produced along with titles:

One Ph.D. scholar is produced with the Ph.D. title “Certain Investigations on Energy Conservation in AC and DC Motor Drives”.