

ACKNOWLEDGEMENT

I pray Almighty to bless me in completing this work. I express my sincere thanks to the Management of Thiagarajar college of Engineering, Madurai and K.L.N. College of Engineering, Sivagangai District who supported me in completing the thesis work.

I express sincere thanks to **Dr. V. Abhai Kumar**, Principal TCE, Madurai and **Dr.A.V. Ram Prasad**, Principal, K.L.N.C.E, Sivagangai District for their constant support in completing this work.

I also express my sincere thanks to **Dr.N.Kamaraj**, Professor & HOD, EEE, TCE, Madurai and **Dr S.M.Kannan**, Professor & HOD, EEE, K.L.N.C.E, Sivagangai District for giving me an encouragement in completing this thesis work successfully.

I express heartfelt gratitude to my research supervisor **Dr.M.Saravanan**, Professor, EEE, TCE, Madurai for his valuable guidance, encouragement and generous help for the successful completion of this work. I extend my sincere thanks to our Doctoral Committee Members **Dr.S.Jeevananthan**, Associate Professor, EEE Pondicherry Engineering College and **Dr G. Saravana Ilango**, Assistant Professor, EEE, NIT, Trichy.

In all, I extend thanks to my family members and friends who helped me to complete this work successfully.


Venkatanarayanan. S

