ACKNOWLEDGEMENT

In the past few years I have been lucky to work with a lot of people which have helped me, in one or the other way, with the hard and stimulating work of researching. This sheet of paper tries to thank them. Surely, it is rather difficult to explain the gratitude I feel saying just words, but I will try......

First and foremost, I would like to thank my mentor and research supervisor, Prof. Kalyan Singh, Department of Physics and Electronics, Dr. R.M.L. Avadh University Faizabad, for his valuable guidance at different stages of this research work. It would have been quite impossible to carry on the research work and make it into the final shape of a thesis without his able guidance and sympathetic encouragement. His affection for me is fondly remembered.

I would also like to thank Dr. R. K. Tiwari, Head, Department of Physics and Electronics, Dr. R.M.L Avadh University Faizabad for putting at my disposal all the necessary facilities available in the department during the course of this work.

I express my special gratitude to Dr. N.K. Chaudary, for his very useful guidance and counseling in overcoming various bottlenecks during the study. I am grateful to all the teachers of the department for their continuous encouragement.

I would like to thank the great help given by my friend Dr. G.R. Mishra, for his sincere effort in proof reading this thesis at various stages including the final stage. I am also greatly indebted to companionship of a small circle of close friends who have continuously supported me throughout these years. I thank them for believing in me and encouraging me in this winding road.
At last, but for me the most important, I want to thank the support received from my whole family, without the love and support of my family, this would have been a very hard journey. I thank my father for teaching me good values such as hard work and sincerity and my mother without whom I would not be the person that I am today. I thank my brother for giving me an unavering love and support.

Finally, my heartiest thanks go to my wife Puja and my son Saushthav whose proximity, love and affection provided me joy and relaxation though they sacrificed a lot of my company.

(Kamlesh Kumar Singh)