ACKNOWLEDGMENT

I would like to take this opportunity to express my immense gratitude to my supervisor, Dr. S.M. Hadi, for his advice, persistent interest and encouragement throughout the course of this work. During the period of this research, I learnt a lot from his sound practical and theoretical knowledge. I specially appreciate his way of instructing which has helped me to learn to work independently.

I am grateful to Professor A.M. Siddiqi for his interest during the period of investigation. I also wish to thank Professor W.Rahman, Chairman, Department of Chemistry, Aligarh Muslim University, Aligarh, for providing the necessary facilities.

I am thankful to Drs. M.Saleemuddin, S.M. Habibul Haque, Masood Ahmad, Asiffuzzaman Siddiqi and Wajid Naqvi for their encouragement and fruitful discussions.

Dr. (Miss) R.Y. Rizvi, Messrs Athar Husain and Saeed A. Khan merit appreciation for their camaraderie. Their altruism, devoted help and exhortation during critical periods of research is incomprehensible.

I sincerely acknowledge the friendly cooperation extended by Dr. N.S. Ahmad, Messrs H.R. Khan, A.S. Khan, S. Ahmad, Q. Hussain, J. Masarrat, I. Khan, and S.A. Husain. I am deeply indebted to Messrs Hassan Ahmad and Jawaid Iqbal for rendering help, sometimes even at their own expense. Dr. (Mrs.) M. Alam, Messrs S.S. Khan, I. Naseem and S. Mohan
deserve thanks for their poignant sincerity and debonair help.

I would also like to acknowledge all my contemporaries for their moral and material support.

Messrs I. Khan, N. Mohammad, Basheer Mian, S. A. Zuberi, N. Alam, D. Mehdvi, M. Ghani and K. Ali are worthy of praise for their technical help and Mr. Saleemuddin Ahmad for drawing figures. Mr. Mashhood Alam Raz deserves a special word of thanks for typing the manuscript.

I am thankful to the Council of Scientific and Industrial Research, New Delhi, for providing financial support during the course of studies.

Finally, my acknowledgment will lack essence if I fail to thank Messrs Sajjads, Shahids, Ahmeds, Chaddhas, Singhs and all my family members whose moral support and blessings have kept me elated throughout my studies.

NASIR KAMAL ALVI