

# Acknowledgements

First of all I express my thankfulness to ALMIGHTY GOD (above all and first of all) for enabling me to complete this work. Apart from the efforts of me, the success of any project depends largely on the encouragement and guidelines of many others. I take this opportunity to express my gratitude to the people who have been instrumental in the successful completion of this Thesis.

Words of gratitude and appreciation do not always convey the depth of ones feelings, yet I wish to record my thanks to my most respected Supervisor Dr. Deepa Sinha, Associate Professor, Department of Mathematics, South Asian University, New Delhi. Her counsel and unfailing kindness encouraged me very much in time, made me realize and enjoy the hard work and the charm of research. I am indebted to her for her able guidance, help, and immense encouragement. Her limitless patience made this colossal task accomplished. I could not have imagined having a better advisor and mentor for my Ph.D study.

I am also indebted to Dr. Trilok Mathur, Assisstant Professor, Department of Mathematics, BITS, Pilani. His guidance helped me in all the time of research and writing of this thesis. I have been amazingly fortunate to have him as a well-wisher and good academician who always was there to help when my steps faltered. I wish to follow his steps to my students too.

I am grateful to my Director Mr. Arpit Agarwal and Principal Mr. S.N. Gupta who laid seeds of enthusiasm and passion in my pursuit of knowledge.

I thank with love to my husband and daughter for understand-

ing me best as a Ph.D. herself. They have been my best friend and great companion. Their love, support, encouragement, and also sometimes entertainment helped me get through this agonizing period in the most positive way. I was continually amazed by willingness of my husband to proof read countless pages of my Thesis.

I cannot imagine my current position without the love and support from my family. I thank my parents, for striving hard to provide a good education for me and my siblings. I always fall short of words and felt impossible to describe their support in words. I also thank my siblings for always being my strength. I would like to express my gratitude to my parents-in-law for their unfailing emotional support. I also thank for their heart-warming kindness.

This acknowledgment would remain incomplete without rendering thanks to my colleagues and friends. Weekends were usually the times I recharged myself by interacting with the friends around. These interactions helped me to improve my skills as a good listener; taught me how to organize my thoughts, and phrase my points. I greatly value their friendship and I deeply appreciate their belief in me.

**Date:** May, 2014

**Ruchi Mathur**  
(Research Scholar)