Acknowledgments

I would like to thank the E. I. DuPont De Nemours and Company for the opportunity in pursuing this project. I would also like to thank my advisor, Dr. Larry Mitchell for his help, support and outstanding patience with me throughout this time in the Master of Science program. In addition, I would like to thank Dr. Robert West and Dr. Alan Kornhauser for being part of my graduate committee. I would also like to thank my parents for their support and patience for my duration at Virginia Polytechnic and State University. I would also like to thank my friends for having patience with me during the completion of this project.