

ACKNOWLEDGEMENT

I joined ICGEB in August, 2008. At that time, I was absolutely naïve; unaware of practically handling most of the techniques. I have learnt a lot here, and hence, wish to thank all those who have made it possible.

I take this opportunity to thank my supervisor, Dr. Navin Khanna, first of all, for taking me as his Ph.D. student. He has been a constant source of motivation and support. He has stood by his students through thick and thin. I feel blessed to have him as my supervisor. His suggestions and comments have always been vital in this project. Some of his teachings have been really special, like 'be a smart worker, not a hard worker' and 'begin with the end in mind'. I really thank him for developing my record-keeping and presentation skills, which would always help me in the future. His habit of completing his tasks well before the stipulated time has always been inspirational.

I also express my sincere gratitude towards my co-supervisor, Dr. Sathyamangalam Swaminathan, who has always been highly approachable. I thank him for all the efforts he has made in this project. I have always been amazed to see his meticulous approach to everything he does.

I would also like to thank Dr. V. S. Chauhan for providing excellent research facilities at ICGEB.

I sincerely thank Dr. Anand Ranganathan for all his support. I appreciate the entire staff of ICGEB for their generous help. I am thankful to Ashokji and other members of animal house, for the immunization studies.

I wish to thank Jogiji for his help. He is one person, who shoulders the responsibility of maintaining the entire lab and he does it extremely efficiently. He is the indisputable favorite of all the students in the lab. I also thank Dinesh for complementing Jogiji so well. They have made our lives easier in lab.

Without the support of fellow RGPians, I might not have been able to enjoy my Ph.D. I thank Nisha for getting me accustomed to the lab and for training me well during my lab rotation period. I am immensely thankful to Gaurav for highlighting the minute intricacies involved in an experiment. I have sought his help in designing a lot of my experiments. I thank Poornima for managing the lab well, which allows the experiments to be completed in time. I would

like to acknowledge her for always being ready to process my samples for visualization under electron microscope. Rajen has been the storehouse of patience and our animal tissue culture specialist. He has been very helpful in all the tissue culture related experiments. Chandra, Kris Sir and Satish have been a strong support of mine in the lab. They have always helped me out in my experiments, for which I sincerely acknowledge them. I sincerely thank Kris Sir for making all the articles accessible to me. Aravind, Talha and Megha have also provided significant inputs during this course. I would like to thank Mani, Lav and Priyanka for all the buffers and reagents they have shared with me.

I thank Niyati, Ashiya, Sushil, Puja, Aarti, Karthik, Sanjeeb, Viswa, Satheesh, Deepak, Vivek, Mohit, Ankur, Aruna and Risto for their support.

I am really thankful to all the people who have contributed in not making my stay at ICGEB boring. I have had a lot of fun in playing games after completion of our work. I thank Meena, Anamika, Sachin, Rajen, Maheshi and Kris sir for being part of it. I have had superb time with Maheshi. She has been one of the most pleasant persons I have ever met. I have always enjoyed going out with Kuhulika for ice candies during summers. Apart from that, she has always gone out of her way to help me out, whenever asked for and even without asking. I would like to thank Niyati for serving us so well in each birthday party.

Finally, I would like to thank the RGP badminton gang- Mani, Lav, Rajen, Priyanka, Shivender, Mohit, Anamika, Anil and pseudo-RGPian Neha, for all the enjoyable moments we have shared while playing badminton.

I thank Neha, Pallavi and Nagisa for being there for me. I acknowledge Prachi for enduring my odd timings of waking up, especially during winters. I could not have asked for a better room partner. She has always stood by me and I truly acknowledge that.

I am thankful to all my batch-mates for all the help and support during this course.

I wish to thank DBT for the fellowship.

I can never thank my parents and sister enough for showering me with their unconditional love, care and support.

Upasana