
200 First Street SW
Rochester, Minnesota 55905
507-284-2511

Kaye M. Reid Lombardo, M.D.
Department of Surgery

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Dear SSAT Board of Trustees:

First, I want to express my gratitude to The Society for Surgery of the Alimentary Tract (SSAT) for awarding me the Career Development Award in 2008. This grant is important as it supports my research on "Inflammation-Related Genes as Risk Factors for Pancreatic Cancer". My interest in inflammation stems from the fact that inflammatory conditions, notably chronic pancreatitis, are risk factors for pancreatic adenocarcinoma. This research serves as an opportunity to determine if there is an association between candidate genes from various inflammatory pathways and pancreatic adenocarcinoma.

In the last year, I completed the didactic requirements for a master's degree in clinical research. I have taken and passed the written test and should be able to submit my thesis within the next year in order to receive the masters degree. I also spent time in the genotyping lab developing hands-on experience with the various genotyping tools. In addition, I spent time with members of the Bioinformatics core learning to utilize the software tools that are available to help with identifying and narrowing my candidate gene list for genotyping.

The grant has helped to fund the bioinformatics fees accumulated during the selection of the candidate genes, the genotyping of single nucleotide polymorphisms (SNPs) and necessary statistical analysis. In March of this year, the first set of genotyping studies evaluated 736 SNPs in 1,300 cases of patients with pancreatic adenocarcinoma and 1,300 healthy controls using the Illumina Goldengate Genotyping Assay platform. These SNPs covered over 60 genes involved in inflammation. Currently, with the help of a statistician, I am performing the statistical analysis to determine if there are any significant associations, and we have preliminarily found some exciting genes that appear to be associated with the development of pancreatic adenocarcinoma in this population. I am in the midst of planning a second set of genotyping using different genotyping platforms to cover SNPs that the Illumina Goldengate technology cannot or failed to analyze. My plan also includes sequencing the regions of the genes that have an association with pancreatic adenocarcinoma. My hope is that within the next year, the grant will also help to perform validation studies of the associations that we have observed. An NIH KL2 Career Development Award also supports my research but without the SSAT foundation grant, I would not be able to analyze this large number of genes due to the high cost of genotyping.

My primary mentors, Dr. Gloria Petersen and Dr. Michael Sarr, have been instrumental in guiding me during the past year. I meet weekly with Dr. Petersen and at least monthly with Dr. Sarr. In terms of publication within this field, I am currently working with Dr. Petersen to write a two-part review geared towards surgeons to improve the understanding on how to interrogate the methodology and findings of published genome association studies. Given the increasing frequency of these studies, it is important that surgeons understand how to interpret these studies. This review is slated for publication in an upcoming issue of the journal, *Surgery*. I am confident that I will complete the first two manuscripts related to this work within the next 6 months to a year.

Please accept my gratitude in helping to support me as I build a solid foundation for a research career that I hope will last a lifetime.

Respectfully,

A handwritten signature in black ink, appearing to read 'Kaye M. Reid Lombardo', written in a cursive style.

Kaye M. Reid Lombardo, M.D.
Assistant Professor of Surgery