

Dr. Arun Swaminath

Summary of study plan:

Crohn's disease affects over 700,000 patients in the U.S. alone. It typically involves inflammation of the small intestine which can be a difficult site to investigate with routine tests such as colonoscopy. Some patients will have more severe disease which require treatment with biologic drugs, however there is currently no way to find out whether patients will respond to the drug, other than to administer it. Approximately 40% of patients will not respond to biologic therapies, hence they will be exposed to the drug and its side effects without any benefit. We are studying techniques which will help us identify patients who will respond to these therapies. Specially, we will be studying images from positron emission tomography (PET) scans, various markers of inflammation in blood tests, and markers of cell turnover on intestinal biopsies to see if they correlate with a positive treatment result.