

NSG Mice

Immunodeficient mouse model

Irradiation

Create a niche for stem cells

Surgery

Implant liver/thymus tissues & inject stem cells

Human Immune Cell Reconstitution

~10 weeks functional human immune system

Antibiotic Treatment

Reduce levels of mouse gut bacteria

Fecal Transplant

Provide human gut microbiome

Step 1
Human Immune System

Step 2
Human Gut Microbiome