Professor Tor Ny receives a 6 MSEK grant from the Erling-Persson foundation over three years for the project "Plasminogen: a novel pro-inflammatory drug to combat infections by antibiotic-resistant bacteria"

Since their discovery, antibiotics have been "wonder drugs" to combat bacterial infections and thereby have saved millions of lives. However, an alarming consequence of increasing antibiotic consumption is the development of antibiotic-resistant bacteria. In the EU, antibiotic resistant bacteria are regularly found in many hospitals, infecting about 4 million and killing about 25 000 patients each year. According to the WHO, without an urgent action, the world is heading towards a post-antibiotic era where common infections, which have been treatable for decades, again will be able to kill. The aim of this project is to develop a novel biologic drug to fight antibiotic resistant bacteria. During the project, the research group will study the molecular mechanisms by which plasminogen activate the innate immune system during elimination of infection in cutaneous wounds in mice. Study whether plasminogen can activate the complement system in vivo and how plasminogen enhances phagocytosis of different bacteria in vivo.

"This translational research project will reshape our understanding on how plasminogen activates the host defense system and will lead to the development of novel treatments to combat infections by antibiotic resistant bacteria without further spreading of antibiotic resistance." says Professor Tor Ny.