

Research in the group

We are interested in a wide range of issues related to mitochondrial biology and cell signaling. Much of our current work is focused on interrelationships between calcium signaling, mitochondria and the plasma membrane calcium pump in cell physiology and pathophysiology. This work embraces questions about the relationship between the endoplasmic reticulum and mitochondria, about the contributions of mitochondrial function to intracellular calcium signaling; about the contributions of mitochondrial dysfunction to cell injury and cell death in cell model for neurodegenerative diseases such as Parkinson's disease and cerebellar ataxia. A special focus is placed on the action of PD related proteins (alpha-synuclein, PINK1, Parkin and DJ-1) on mitochondrial function.