

31st International Conference on

DIABETES AND ENDOCRINOLOGY

February 06, 2023 | Webinar

Received date: 17-11-2022 | Accepted date: 18-11-2022 | Published date: 01.03.2023

Brain insulin signaling in metabolic homeostasis and disease

Christoph Buettner

Rutgers University, USA

Insulin signalling in the central nervous system regulates energy homeostasis by controlling metabolism in several organs and by coordinating organ crosstalk. Studies performed in rodents, non-human primates and humans over more than five decades using intracerebroventricular, direct hypothalamic or intranasal application of insulin provide evidence that brain insulin action might reduce food intake and, more importantly, regulates energy

homeostasis by orchestrating nutrient partitioning. In my presentation I will discuss the metabolic pathways that are under the control of brain insulin action and explains how brain insulin resistance contributes to metabolic disease in obesity, the metabolic syndrome and type 2 diabetes mellitus.

e: cb1116@rutgers.edu