Neurochemical changes associated with Parkinson´s disease and L-Dopainduced dyskinesia

https://neurodegenerationresearch.eu/survey/neurochemical-changes-associated-with-parkinsons-disease-and-l-dopainduced-dyskinesia/

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Country

Sweden

Title of project or programme

Neurochemical changes associated with Parkinson´s disease and L-Dopainduced dyskinesia

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The Swedish Brain Foundation

Total sum awarded (Euro)

€ 54,407

Start date of award

01/07/2015

Total duration of award in years

1.5

Keywords
Research Abstract

The main objective of the present research is to study functional neurochemical processes in Parkinson
disease (PD) and specifically L-3,4-dihydroxyphenyl-alanine (L-DOPA)-induced dyskinesia (LID). To address the issues raised in the present project we have access to a comprehensive and truly unique biobank of primate brain tissue (Macaca fascicularis) consisting of seven experimental groups. Furthermore, we are investigating several novel drug therapeutic

approaches emerging for PD and LID and their effect on neurotransmitters, neuropeptides and proteins in rodents. The proposed project utilizes state-of-the-art proteomics and mass spectrometry technology approaches for
the investigation of neurotransmitter, protein, and peptide concentrations and interactions in the basal ganglia and associated structures in dyskinetic and non-dyskinetic subjects. Pathway analysis is performed to convert quantitative data on the expression levels of proteins and peptides into the quantitative signaling status of the cells. Novel mass spectrometry methodology is used to image and
quantitate neurotransmitters and their precursors directly in brain tissue sections. The present project is a continuation of the last year’s funded application.

Further information available at:

Types:
Investments < €500k

Member States:
Sweden

Diseases:
N/A

Years:
2016

Database Categories:
N/A

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