Conférence

CRCHUM

Université **m** de Montréal

AXE NEUROSCIENCES

CONFÉRENCIER

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Development of antibody approaches to target TDP-43 pathology in ALS and dementia

Amyotrophic lateral sclerosis (ALS) is a fatal neurologic disease characterized by progressive degeneration of motor neurons that leads to paralysis and death within 3-5 years following onset. Only few drugs are available for ALS and they confer only modest slowing of disease. In both familial and sporadic ALS cases, affected neurons exhibit cytoplasmic accumulations of a protein called TDP-43. Few years ago, we generated a mouse monoclonal antibody against TDP-43 which is unique in that it recognizes cytoplasmic TDP-43 but not nuclear TDP-43. From this monoclonal antibody, we have also derived a single chain antibody (scFv) which can be delivered to neurons via AAVmediated transduction. Our results suggest that treatments based on scFv antibody or full length antibody targeting TDP-43 can confer therapeutic effects in various mouse models of ALS and dementia.

Le mardi 14 mars à 9 h Heure normale de l'Est (États-Unis et Canada)

L'AUDACE DE CHERCHER PLUS LOIN Amphithéâtre du CRCHUM, R.05.212A 900 rue Saint-Denis Montréal (QC)

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