

Guest lecture

Worms, Fat and Mass Spec - Investigations into the *Caenorhabditis elegans* lipidome



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Date: 25th April 2019

Time: 11:15

Place: Lykeion

Host: Professor Nils J. Færgeman, BMB, SDU.

Abstract

The biomedical model organism *Caenorhabditis elegans* is one of the premier model organisms to study lipid metabolism. However, lipidomics, the systematic analysis of “all” lipids in a given organism or system, only recently joined the *C. Elegans* tool box. Uplc-uhf-tof-ms is used to study changes in the lipidome upon different perturbations. In this presentation the current development and applications, but also shortcomings and limitations of lipidomics in the worm are discussed. Specifically,

the in-depth analysis of sphingolipids and efforts for the largescale identification of lipids in the worm will be presented.