Contribution ID: **490** Type: **Poster simulations**

Samak: Matlab Simulation and Analysis for the KATRIN experiment

The KArlsruhe TRItium Neutrino (KATRIN) experiment aims to determine the effective mass of the electron-antineutrino with an sensitivity of 200 meV/c2 (90% C.L.).

The neutrinos mass can be inferred from the shape of the endpoint energy-region of the tritium beta spectrum, which is measured using the largest MAC-E filter and an intense Windowless Gaseous Tritium Source (WGTS).

SAMAK is a new software developed to simulate and analyze the electron spectrum of the tritium beta decay, with the incorporation of the state of the art modeling of the spectrum.

In this poster an overview of the figures of SAMAK will be given. Preliminary results concerning the first KATRIN Tritium data from May 2018 will be presented.

Session and Location

Monday Session, Poster Wall #158 (Ballroom)

Poster included in proceedings:

yes

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Track Classification: Poster (not participating in poster prize competition)