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## MOMENTA –Multi-Observations Multi-Energy Neutrino Transient Analysis

Neutrinos play an important role in multi-messenger astronomy, as they can probe dense environments and thus provide important insights into the properties of the sources. Multiple neutrino telescopes continuously observe the sky, across many decades of energies from MeV to PeV, and are often used for follow-up searches of transient phenomena detected by other messengers. MOMENTA is an open-source software combining different experimental data to characterise astrophysical emission from these objects. More specifically, its Bayesian framework converts neutrino observations into constraints on the neutrino luminosity, the spectral shape, and other astrophysical parameters. The contribution will first outline the scope of the tool, followed by some detailed examples using public data from large neutrino telescopes. Then, prospects will be presented, such as stacking analyses, studies exploiting detailed timing information, and the construction of neutrino energy distributions for transient phenomena.

### Collaboration(s)

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