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## Quark Transversity Distributions in the Nucleon using the LaMET approach

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We report a state-of-the-art lattice QCD calculation of the isovector quark transversity distribution of the proton in the continuum and physical limit using large-momentum effective theory. The calculation is done at three lattice spacings  $a \approx \{0.085, 0.064, 0.049\}$  fm and various pion masses  $m_\pi \approx \{350, 280, 220\}$  MeV, with the proton momenta up to 2.8 GeV. The result is non-perturbatively renormalized in the hybrid scheme with self-renormalization which is the only infrared-free approach known so far, and extrapolated to the continuum, physical and infinite momentum limit. We also make a comparison with recent global analyses for the nucleon isovector quark transversity distribution.

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