First Rosenbluth separation on π^0 at Jefferson Laboratory-Hall A

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on behalf of the Hall A DVCS collaboration

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Although being a higher-twist contribution, the transverse response was assumed to be responsible of the large π^0 electroproduction cross sections measured by the Hall A and CLAS collaboration. However no Rosenbluth separation has been performed yet to verify this assumption.
We will present new results of π^0 electroproduction cross sections in the valence region (x_{Bj}=0.36) at three Q^2-values (1.5, 1.75 and 2 GeV^2).
Unlike the previous data sets, each kinematical setting was run with two beam energies. It allows to perform, for the first time, the separation of the longitudinal and transverse contributions.