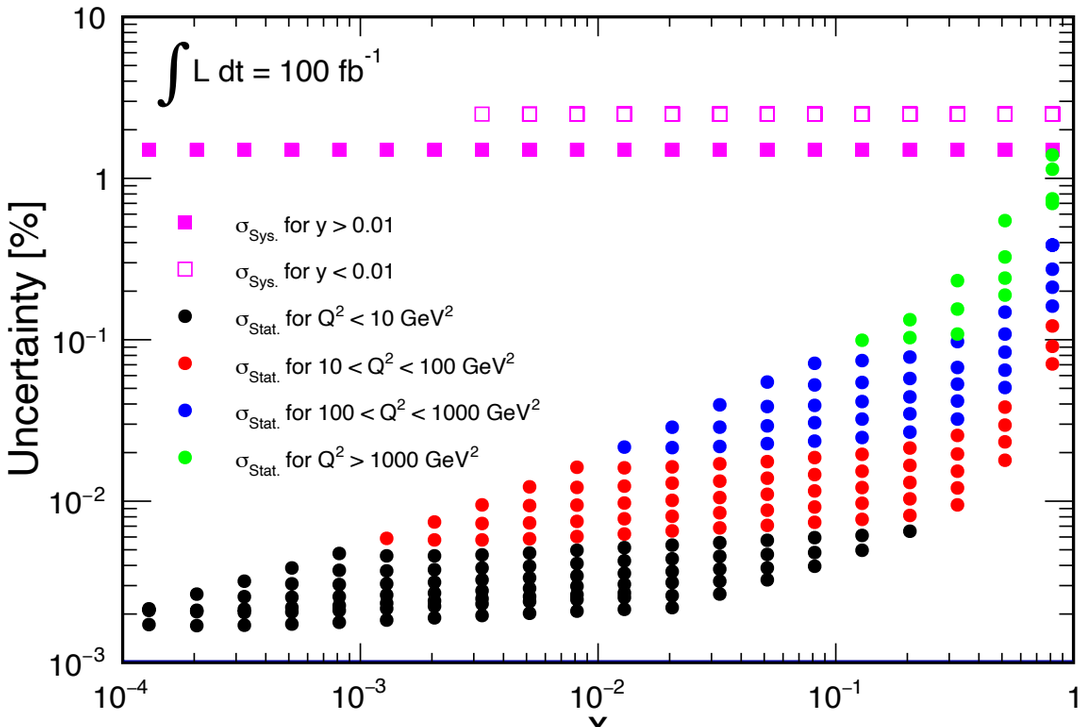
Measurements with inclusive reactions

- Structure functions:
  - F_2^A at low-x (NC and CC)
  - $F_L^A(x, Q^2)$ (requires multiple $\sqrt{s}$)
- Double spin asymmetries A_{LL} and A_{LT}:
  - A_1^p vs. x (longitudinally polarized proton)*
  - A_1^n vs. x (longitudinally polarized ^{3}He)*
  - Twist-3 g_T^A vs. x (transversely polarized proton, ^{2}H, ^{3}He)

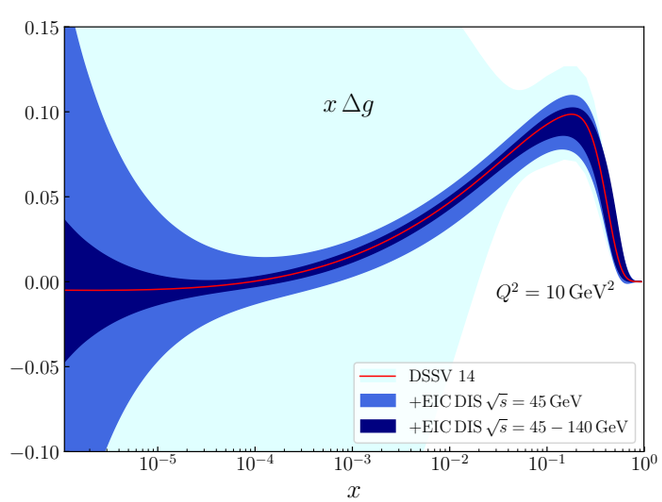
*overlap with Tagging & Diffraction WG?

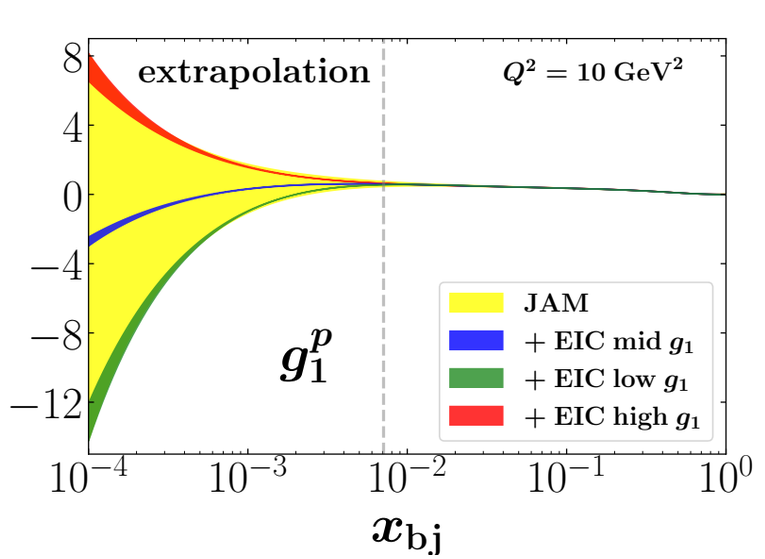
Related plots from YR

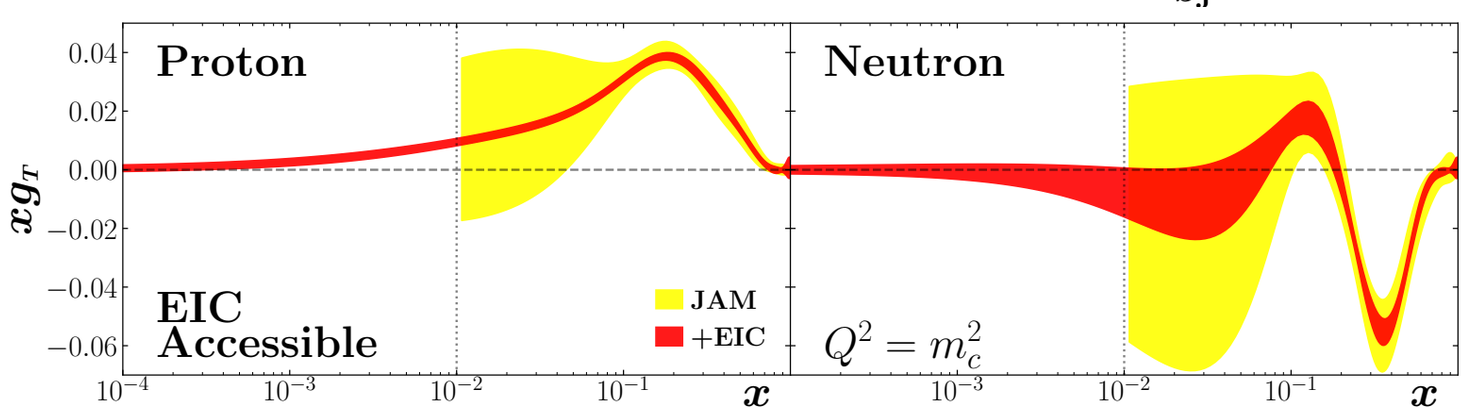


Kinematic reach

Impact

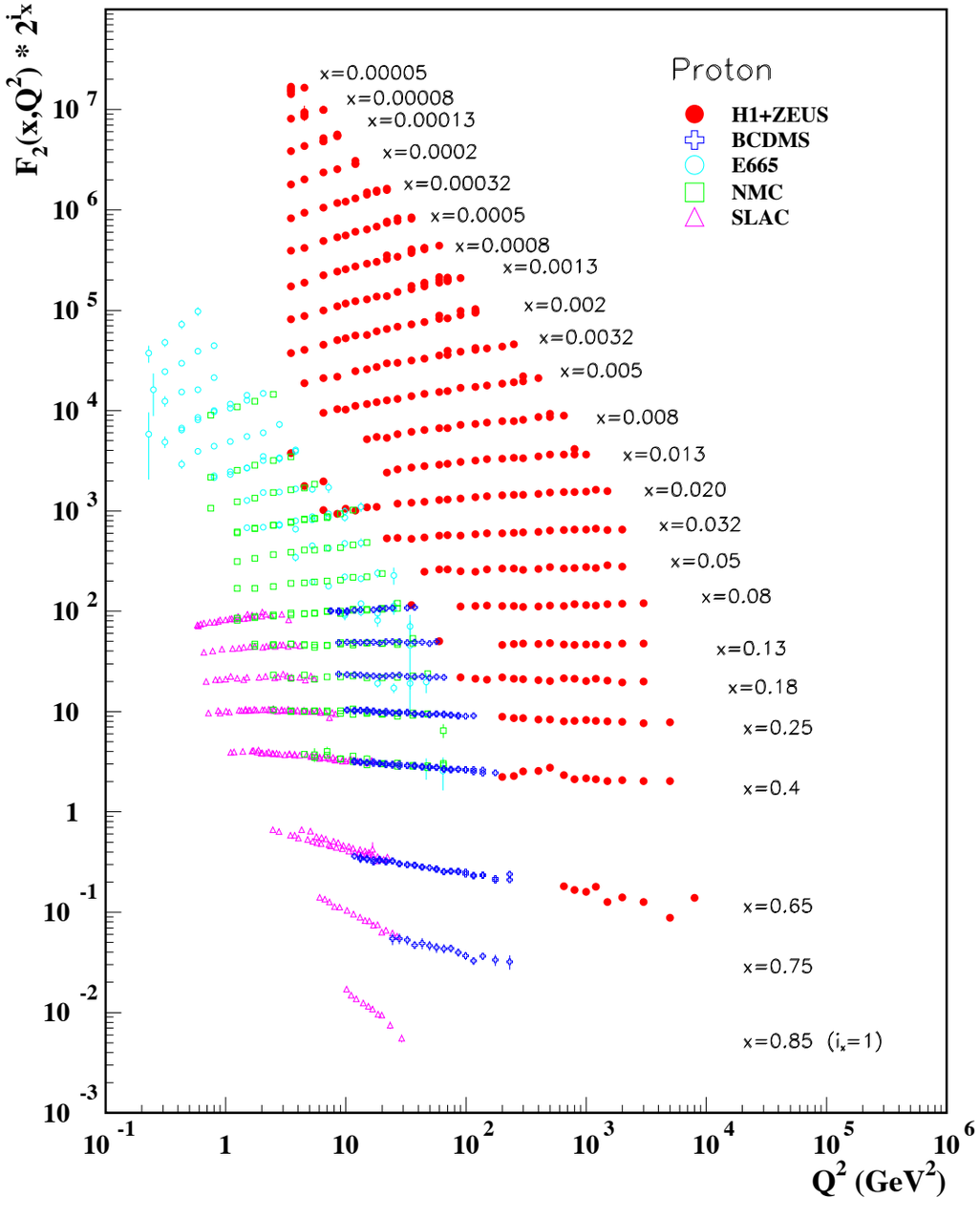






Plots for ECCE

- Focus on observables (structure functions, asymmetries, etc.)
- PDG-style plot of projected structure function measurements across all x, Q^2



Simulation

- Neutral current (detect scattered electron):
  - Get electron resolution from fun4all, then use physics generator + fast smearing?
  - Study background suppression with electron/pions in fun4all
  - Separate physics from background
- Charged current (detect hadronic final state):
  - Jacquet-Blondel method (sum momentum, energy of final state hadrons)
  - "Smearing" approach okay, or is full simulation required?
  - What background to worry about?

Event generators

- DJANGOH
  - NC/CC structure functions
  - Longitudinal polarization
  - Nuclear targets, or just proton?
    - Could be used for F_2^A, F_L^A, A_{LL}
- Nuclear targets?
- Transversely polarized targets for A_{LT}?