

Graduation Plan

Jie Liu

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Graduation Plan

PhD Thesis Topics --will include three parts

- Polarized ^3He target upgrade for future experiment (JLab Based)
- G2p analysis (JLab based)
- ^3He pellet study for polarized fusion (Nuclear physics application)

G2p Analysis Progress Summary

- PID study (completed)
- multi-track efficiency study (completed)
- energy loss model study (completed)
- Yields drift -- resolved half of momentum settings which have yields drift (7% of data has drift issue)
- Beam position study – found two main problem with previous bpm calibrations (current dependence and position jumps).

G2p Topic

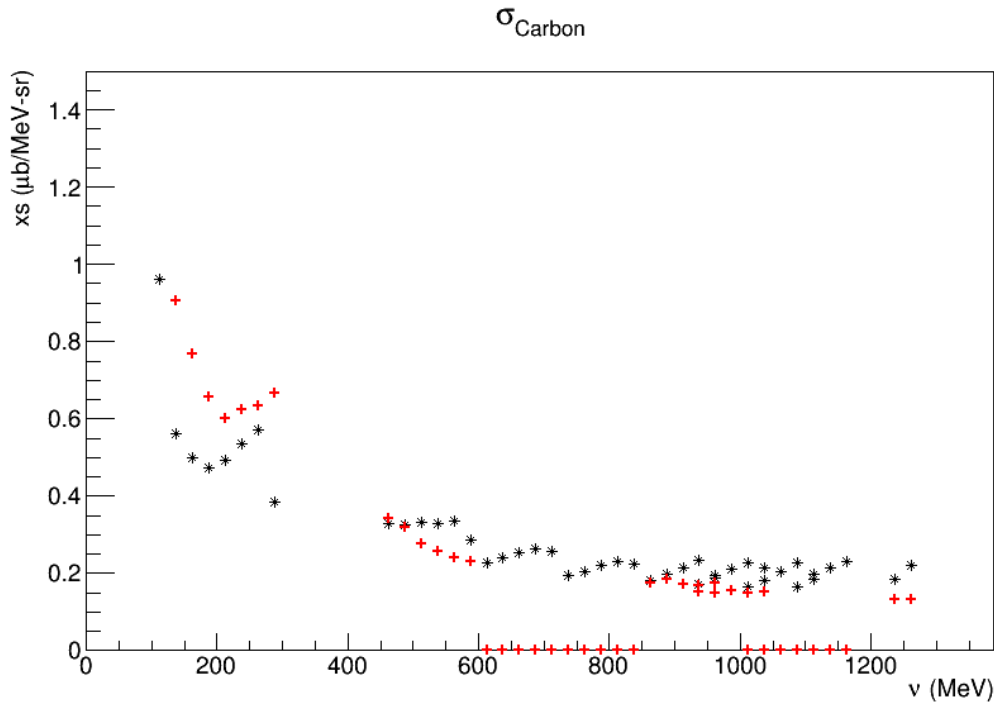
- Plan to focus more on 5T settings, wrap up the bpm and yields study soon, possibly some look on cross section.
- Will include the analysis up to May.

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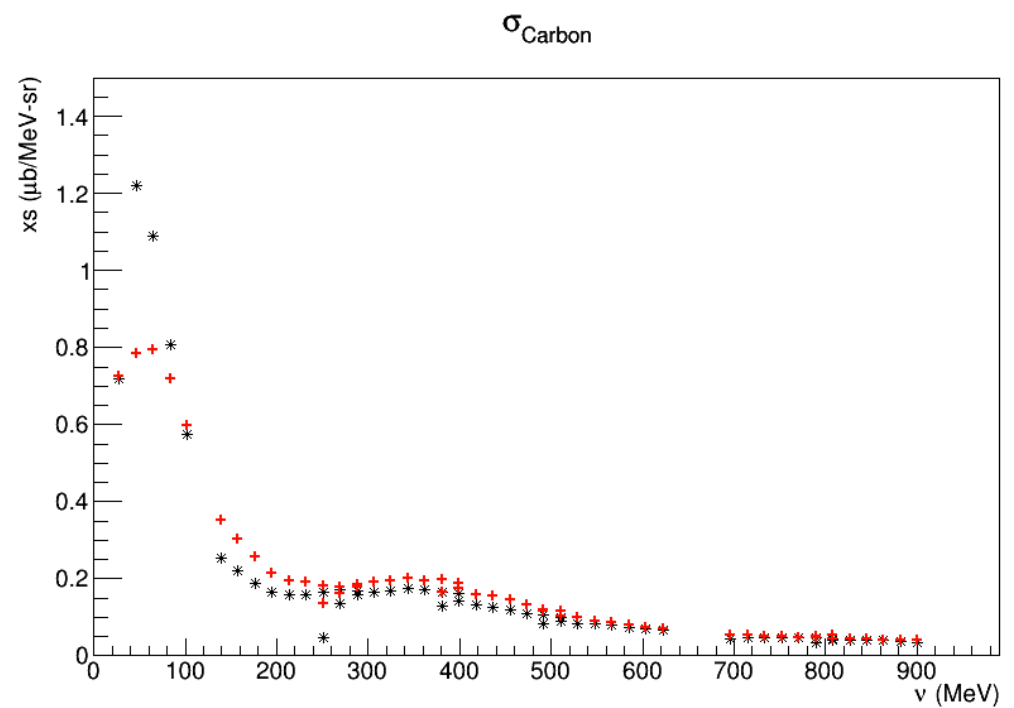
- Start to look for job in industry, will graduate in May.

Carbon Cross Section Study

2.2GeV 5T longitudinal



2.2GeV 5T longitudinal



Red: simulated (included both elastic tail + inelastic)

Black: Data (corrected with acceptance got from g2psim)

He background subtracted in data

Data yields has the saw shape for longitudinal setting