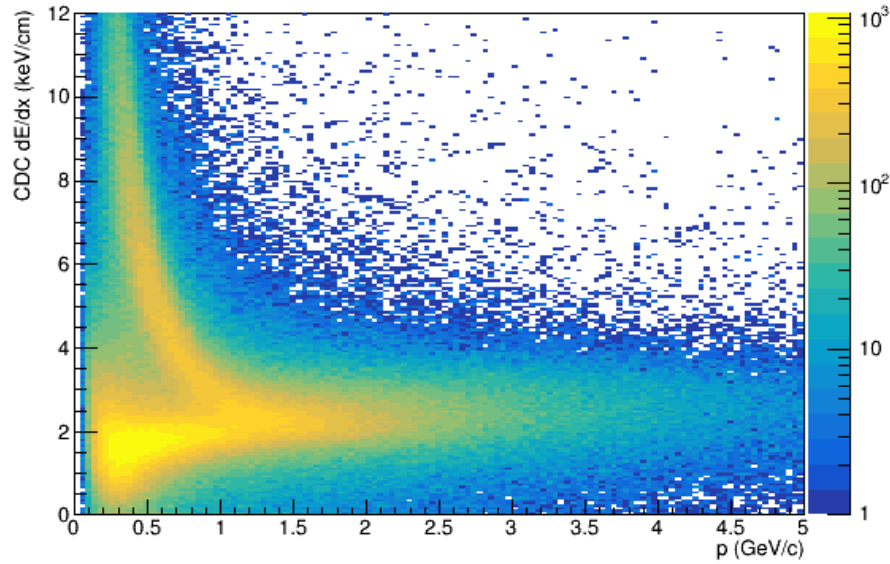


## CDC $dE/dx$ (from integral) with constant pedestal

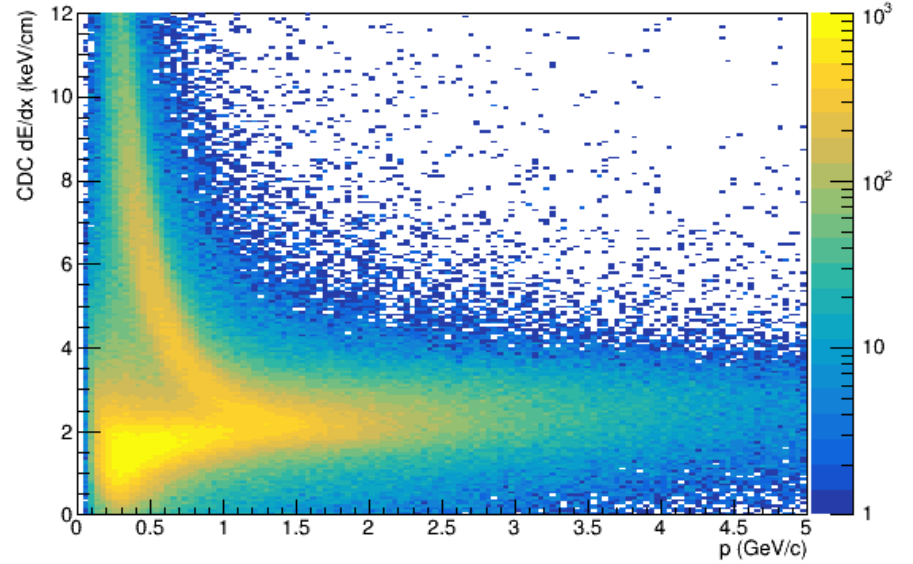
30570 5mm collimator, 58um diamond, 100nA, 1350A, 33kHz

31001 5mm collimator, 58um diamond, 147nA, 1350A, 50kHz

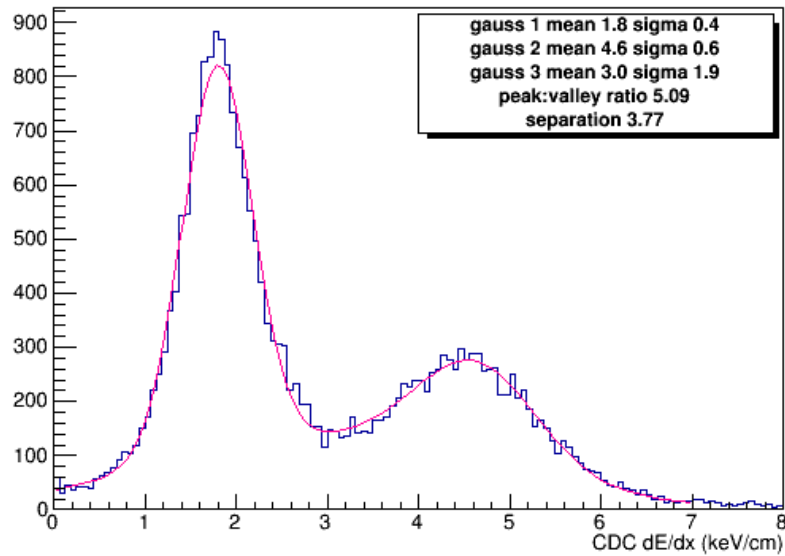
q<sup>+</sup> Original dE/dx code, Run 30570



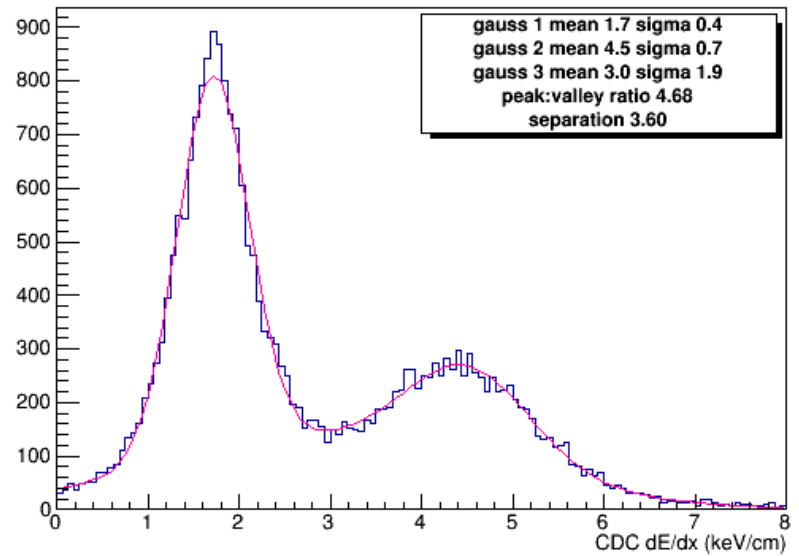
q<sup>+</sup> Constant pedestal, Run 30570



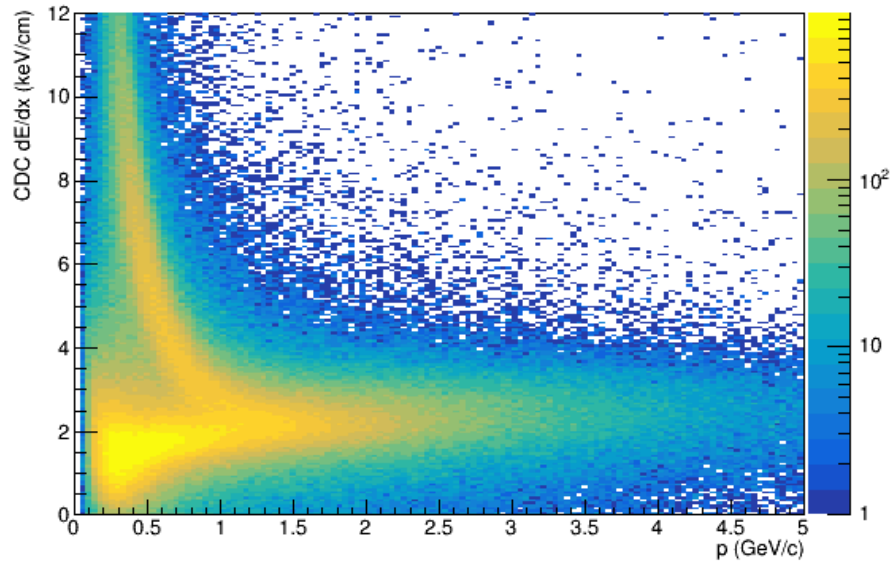
Projection for p=0.60 to 0.64 GeV/c



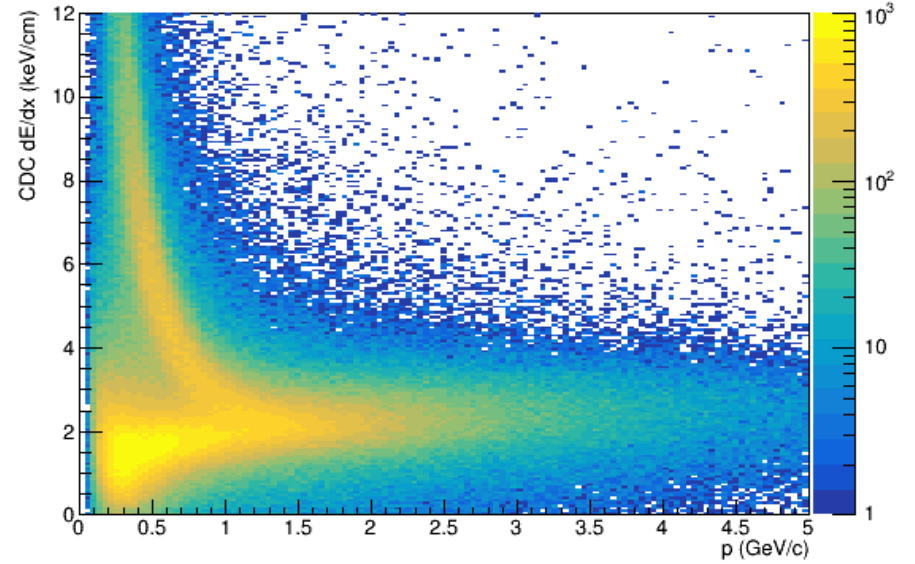
Projection for p=0.60 to 0.64 GeV/c



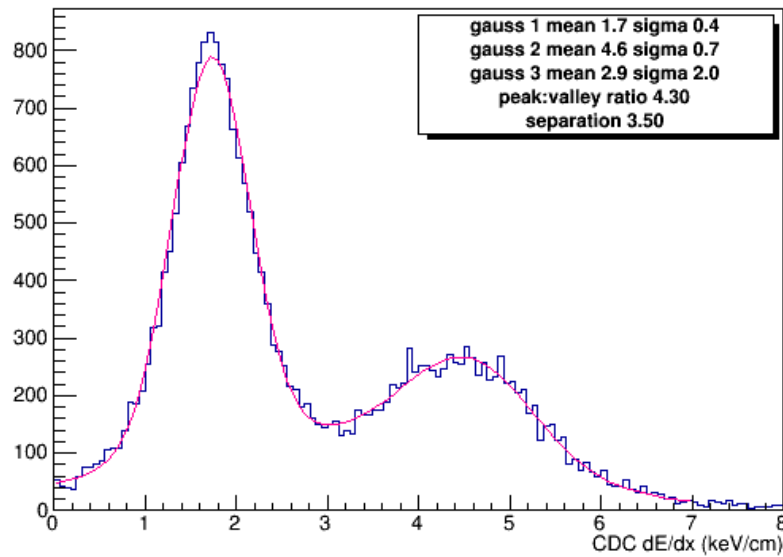
q<sup>+</sup> Original dE/dx code, Run 31001



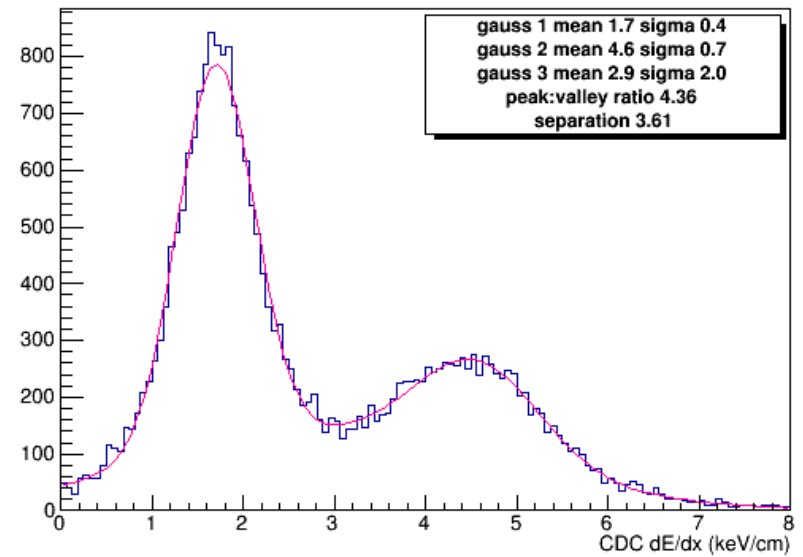
q<sup>+</sup> Constant pedestal, Run 31001



Projection for p=0.60 to 0.64 GeV/c



Projection for p=0.60 to 0.64 GeV/c



| <b>Run</b> | <b>Event rate</b> | <b>Original dE/dx separation</b> | <b>Constant pedestal separation</b> | <b>Amplitude dE/dx separation</b> |
|------------|-------------------|----------------------------------|-------------------------------------|-----------------------------------|
| 30570      | 33kHz             | 3.8                              | 3.6                                 | 4.6                               |
| 31001      | 50kHz             | 3.5                              | 3.6                                 | 4.6                               |