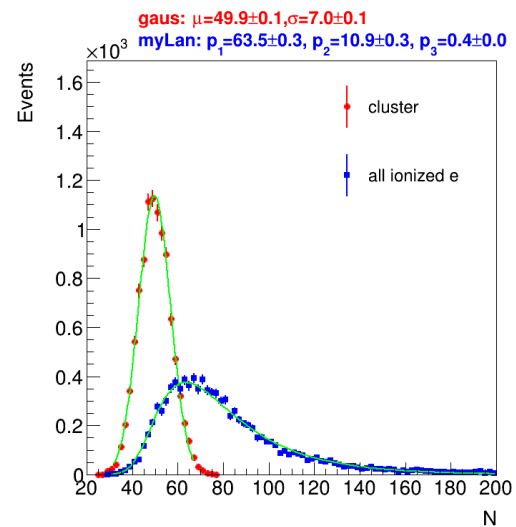
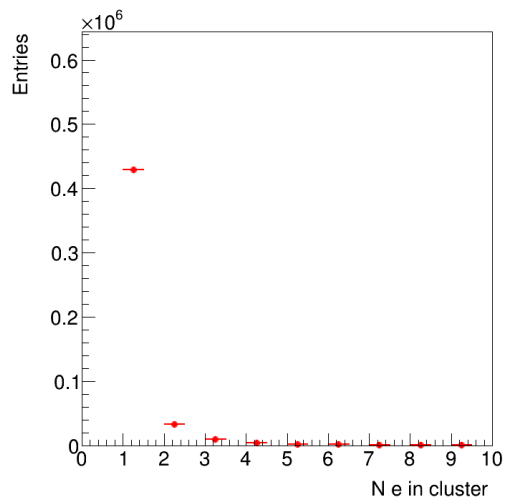
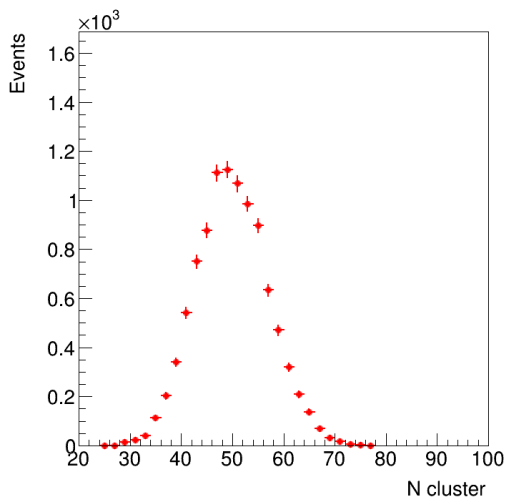
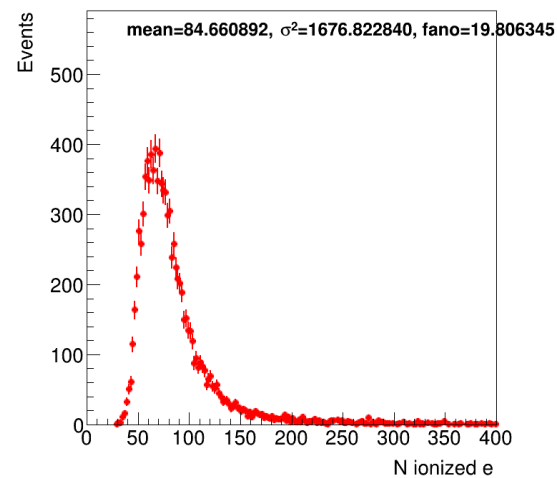
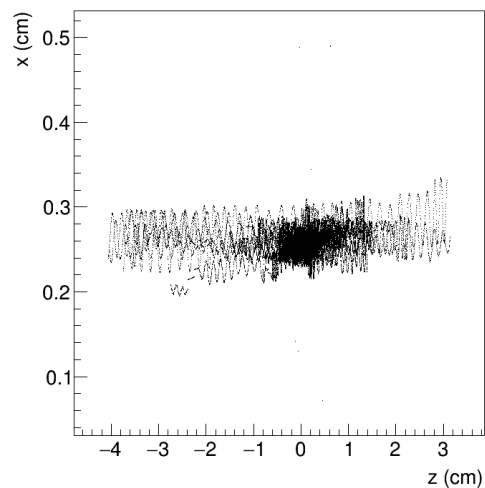
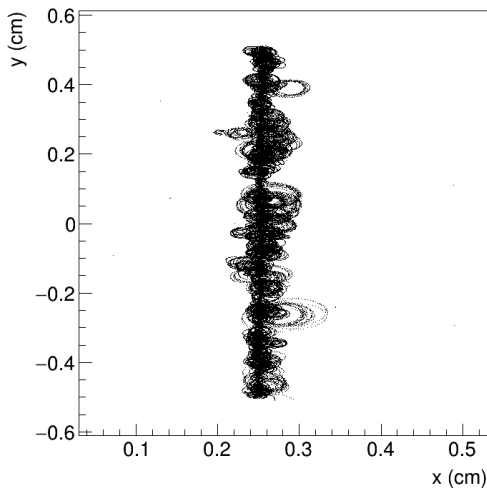


- Gas: 50% He + 50 % C₄H₁₀
- TrackHeed:
 - Cluster density: 47.403 cm⁻¹
 - Stopping power (restricted): 2.33135 keV/cm
 - Stopping power (incl. tail): 2.46105 keV/cm
 - W value: 24.3944 eV
 - Fano factor: 0.19
 - Min. ionization potential: 10.55 eV

Garfield++ alone

- Cell size 1×1 cm (1 signal wire around by 8 field wires)
- π^- momentum 1 GeV



Production cut

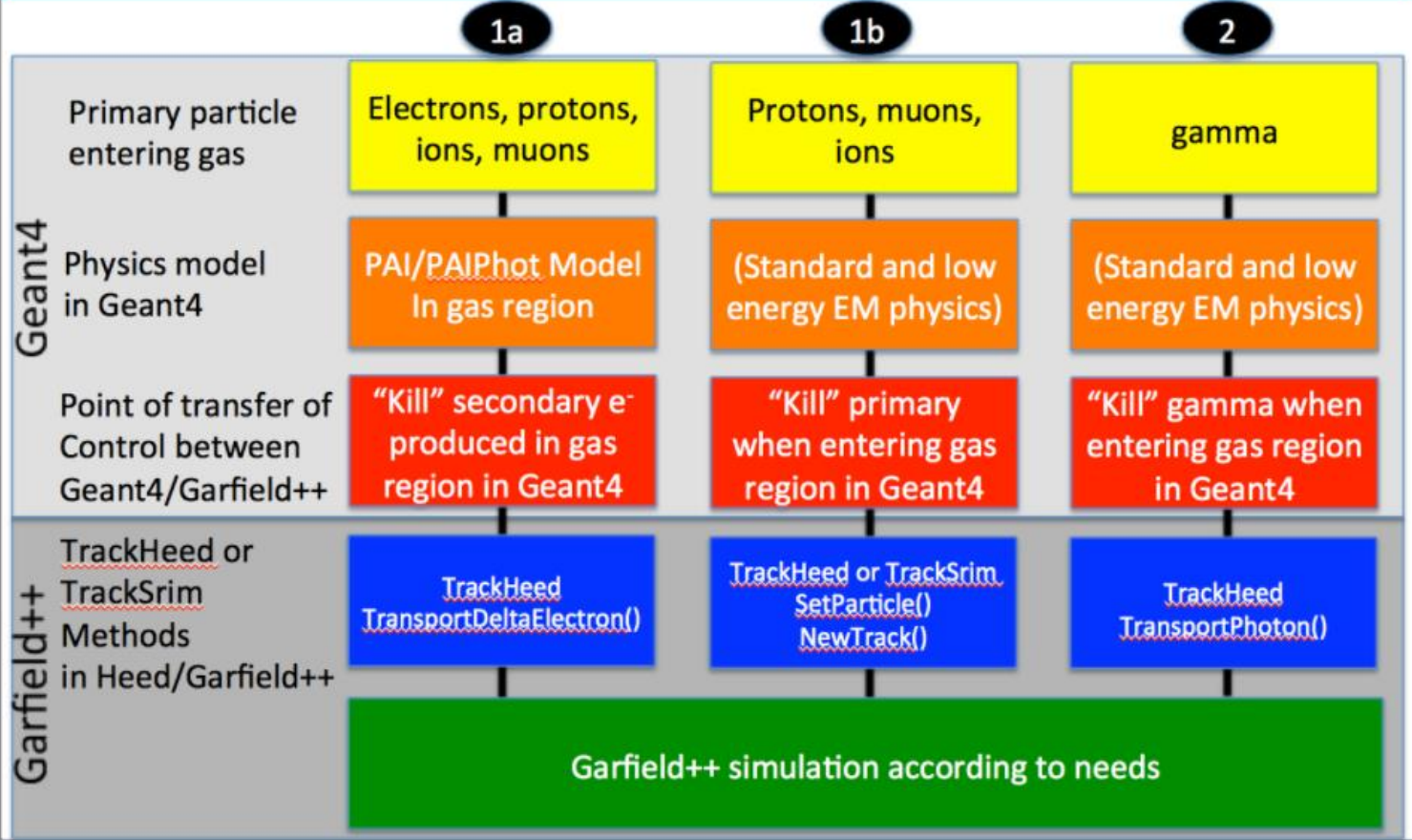
```
G4ProductionCutsTable::GetProductionCutsTable()->SetEnergyRange(fPAIEnergyCut,100*unit::GeV);
G4Region *region = G4RegionStore::GetInstance()->GetRegion("RegionGarfield");
G4ProductionCuts * cuts = new G4ProductionCuts();

// By setting the range to 0 * mm, the actual production cut in RegionGarfield will be same w
cuts->SetProductionCut(0., G4ProductionCuts::GetIndex("gamma"));
cuts->SetProductionCut(0., G4ProductionCuts::GetIndex("e-"));
cuts->SetProductionCut(0., G4ProductionCuts::GetIndex("e+"));

if (region) {
    region->SetProductionCuts(cuts);
}
```

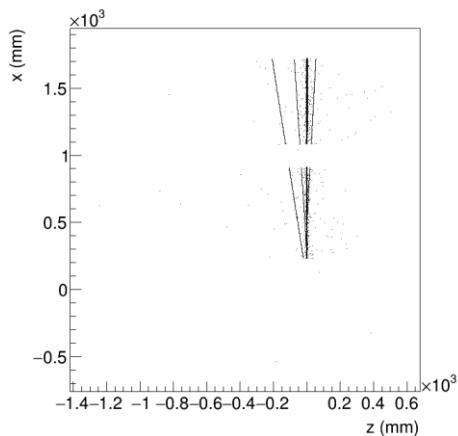
From COMET

Task division Geant4/Garfield++

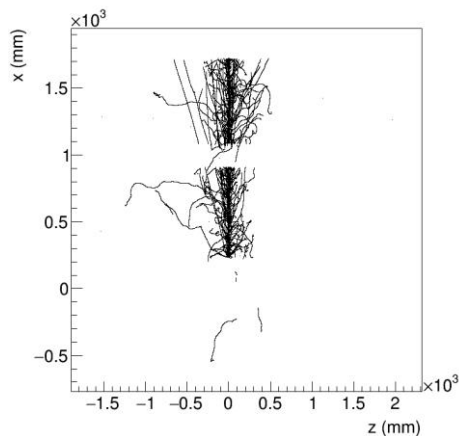


Geant4 + Garfield++

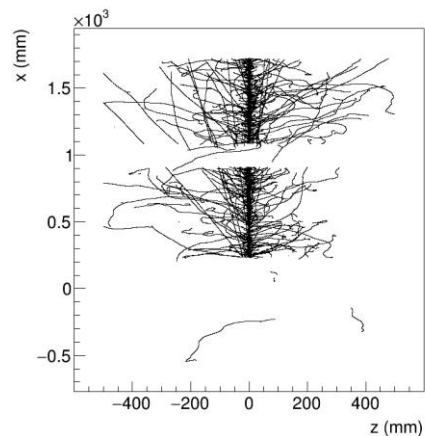
- Production cut: 19.01 eV
- Transfer energy threshold: 500 eV
- π^- momentum 1 GeV



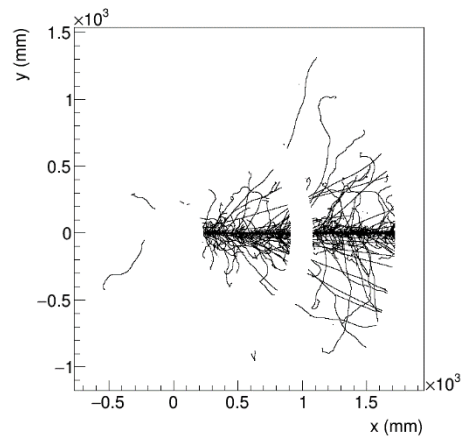
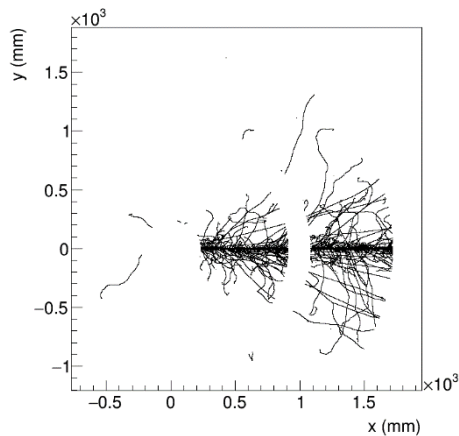
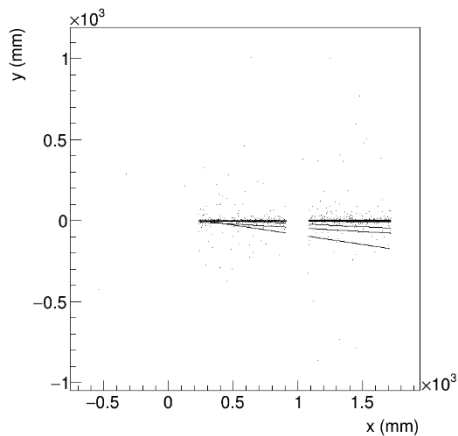
G4 e primary



G4 e secondary



All electrons



Geant4 + Garfield++

- Production cut: 19.01 eV
- Transfer energy threshold: 500 eV
- 1 GeV π^-

