ITTF Tracking Efficiency

200GeV AuAu central, Minbias data
run321,274

Lots of help from ITTF code developers and J. Lauret

Outline

Selection of track (cuts) in analysis

Comparison between ITTF and TPT tracks

- Multiplicity (centrality cuts)
- Nftpnts distribution
- Global dca distribution
- Efficiency vs
  - pT, eta, centrality

CUTS

Centrality (Nch):

|eta|<0.5,|z|<25cm, nFtPnts>=10, primary

pT Spectra:

|eta|<0.5,|z|<25cm, nFtPnts>15, primary

dEdx bands:

|eta|<0.5,|z|<25cm, nFtPnts>=25

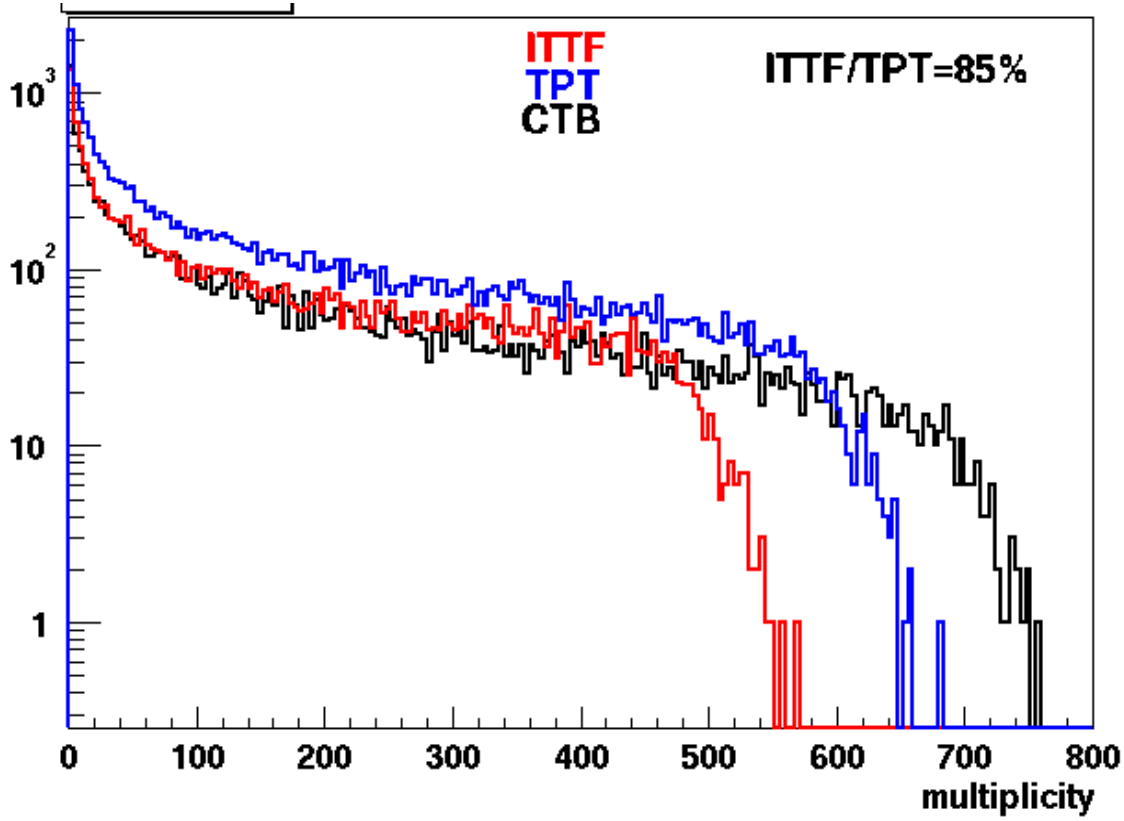
Multiplicity

Overall Efficiency:
ITTF/TPT=85%

Centrality definition
Is different between
ITTF and TPT

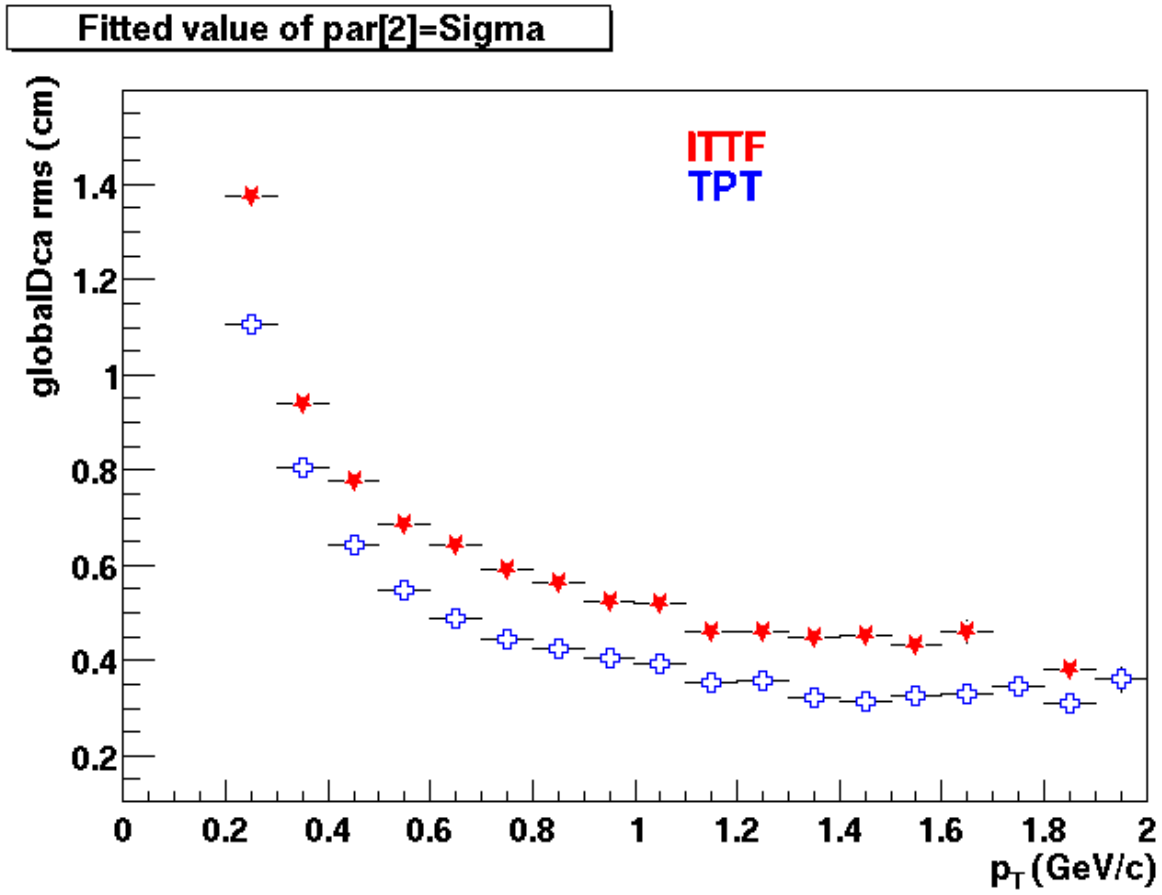
Using CTB multiplicity

CTB/50≈Nch



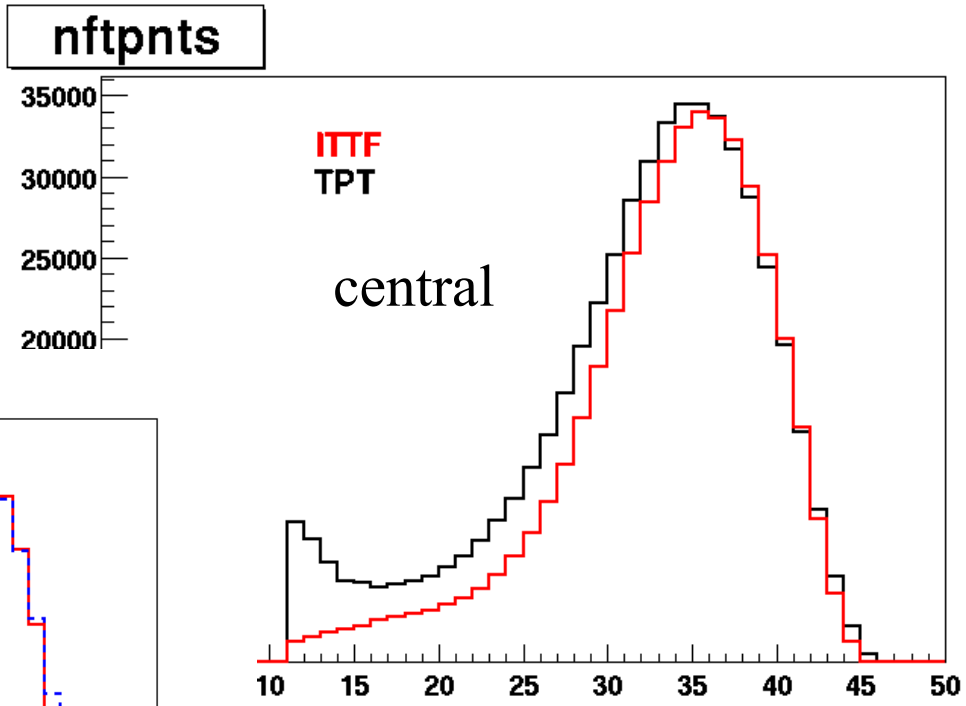
Global DCA

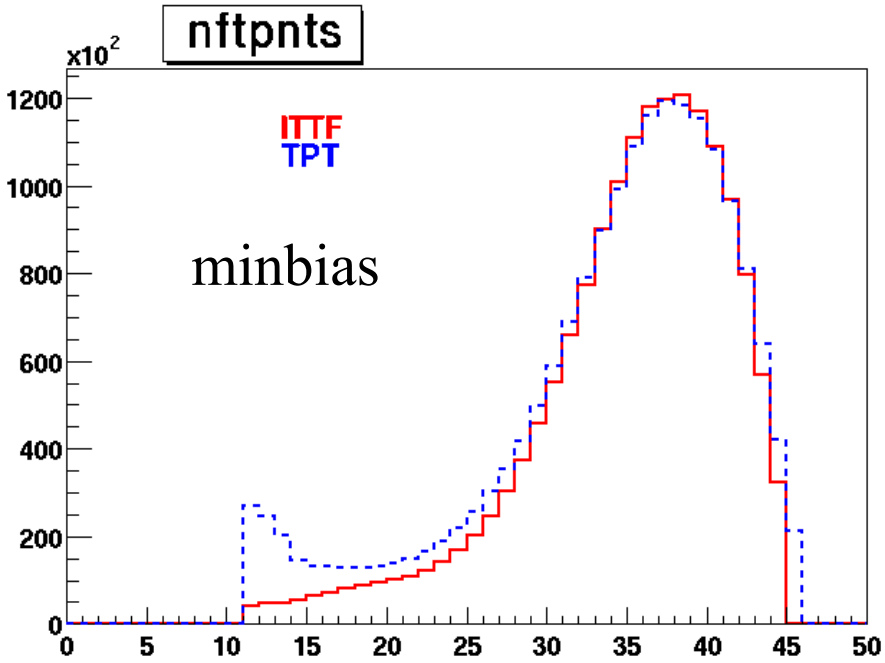
ITTF>TPT



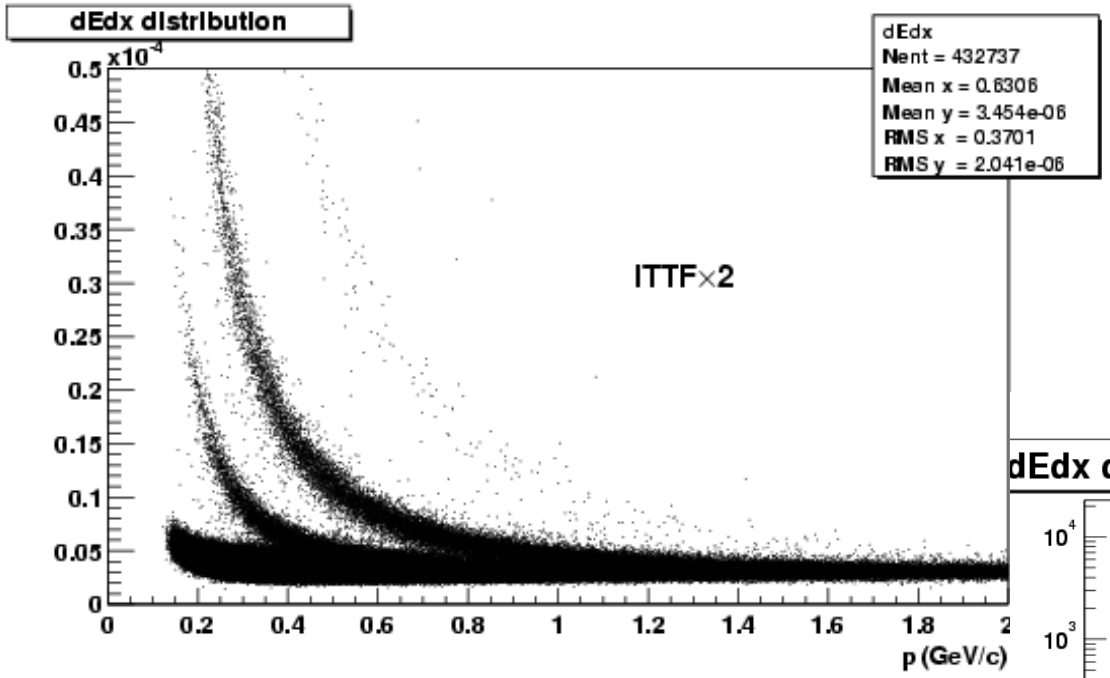
FitPoints Distribution

Inefficiency at
low nftpnts□low pT

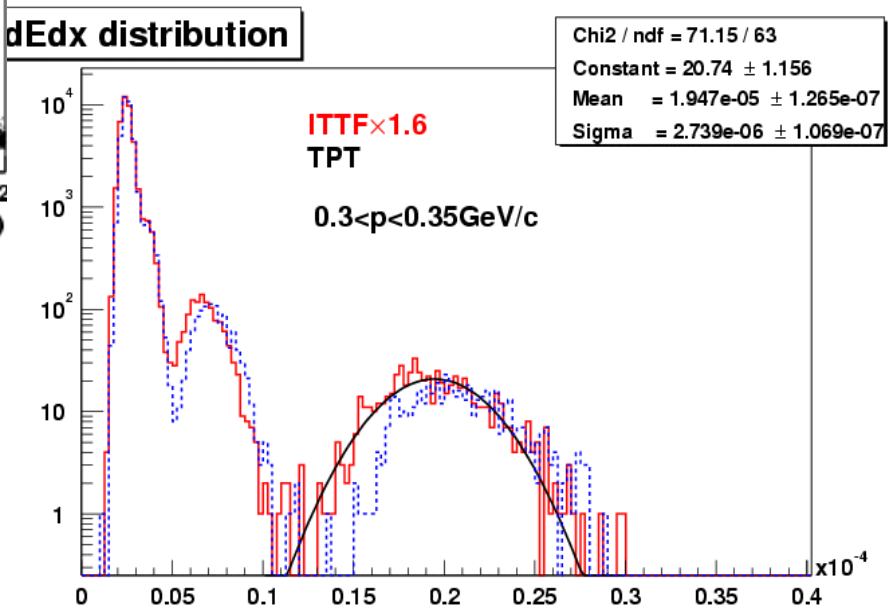




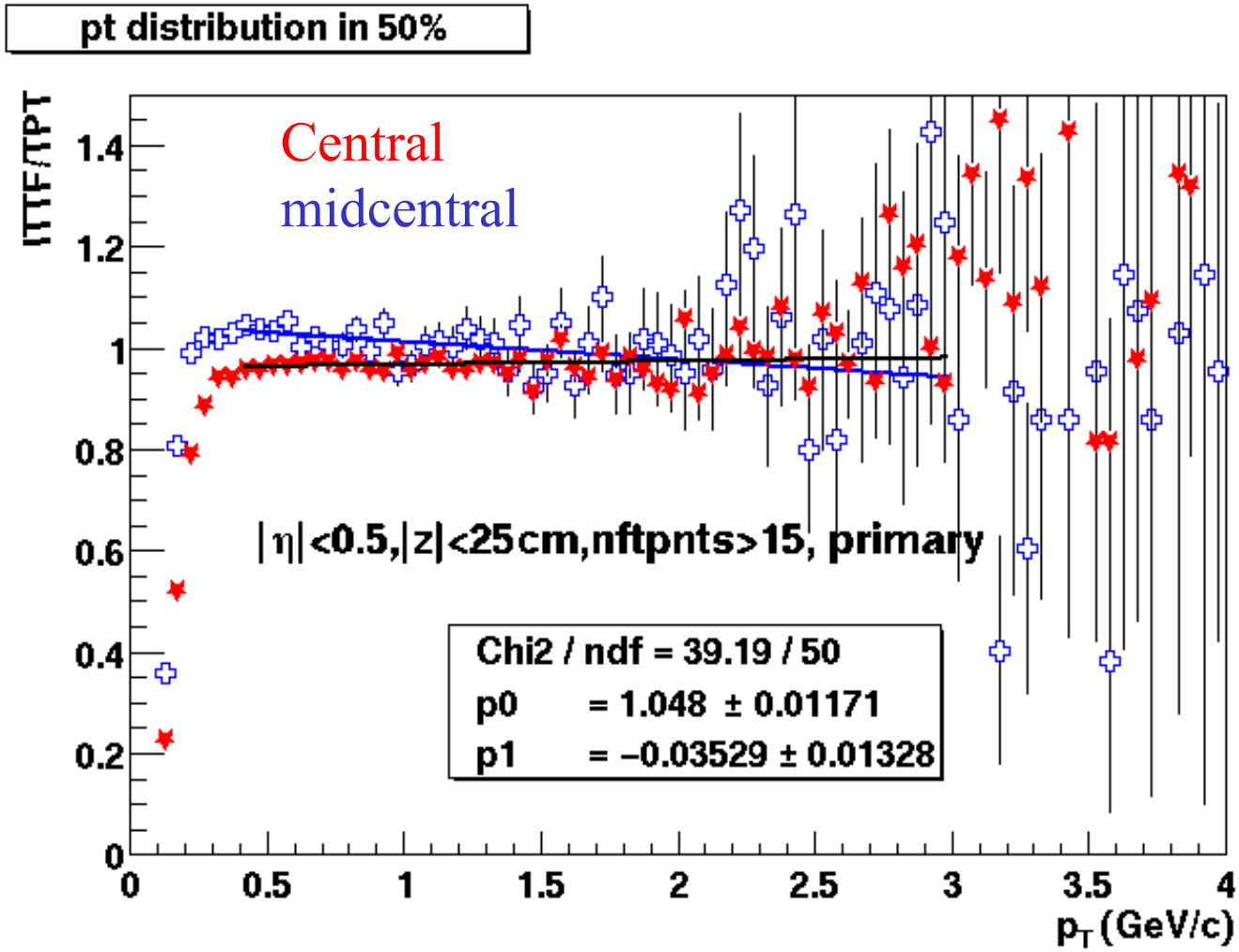
dEdx



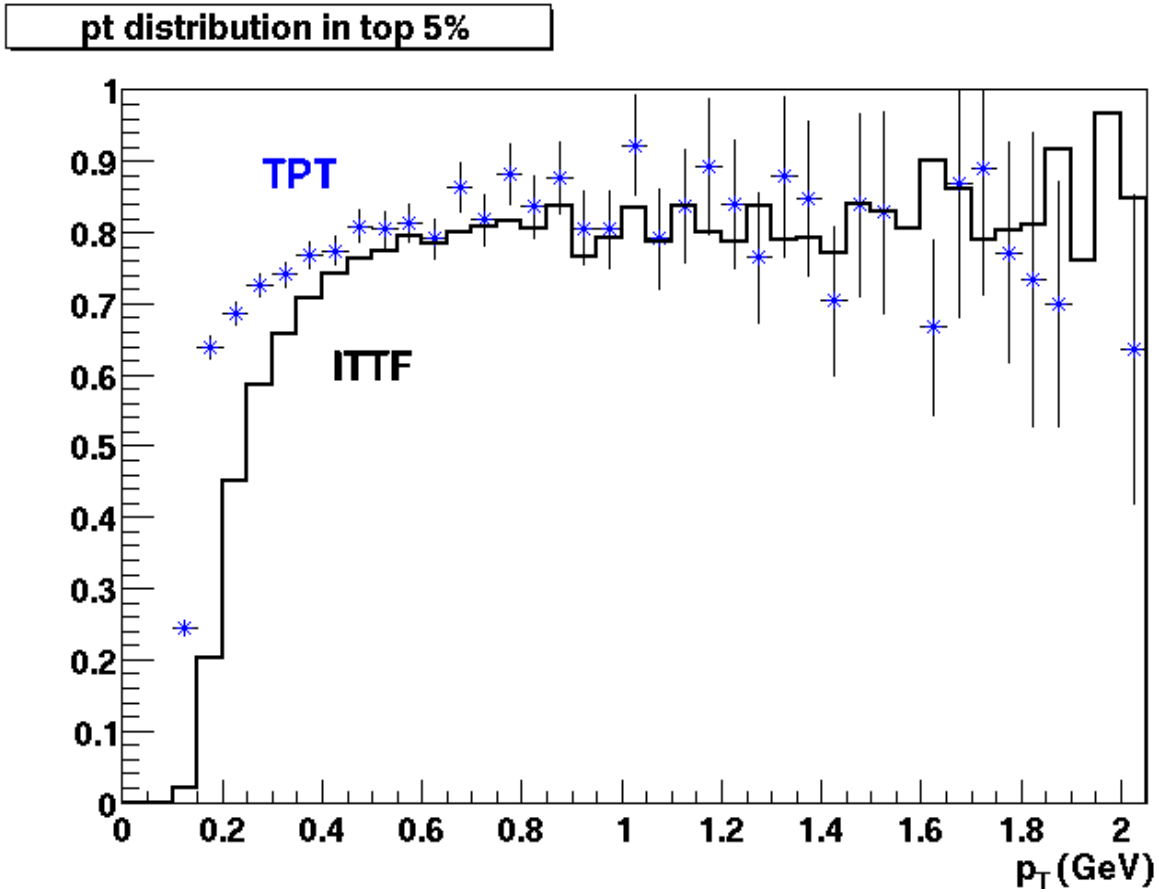
Clear dEdx bands
work in progress



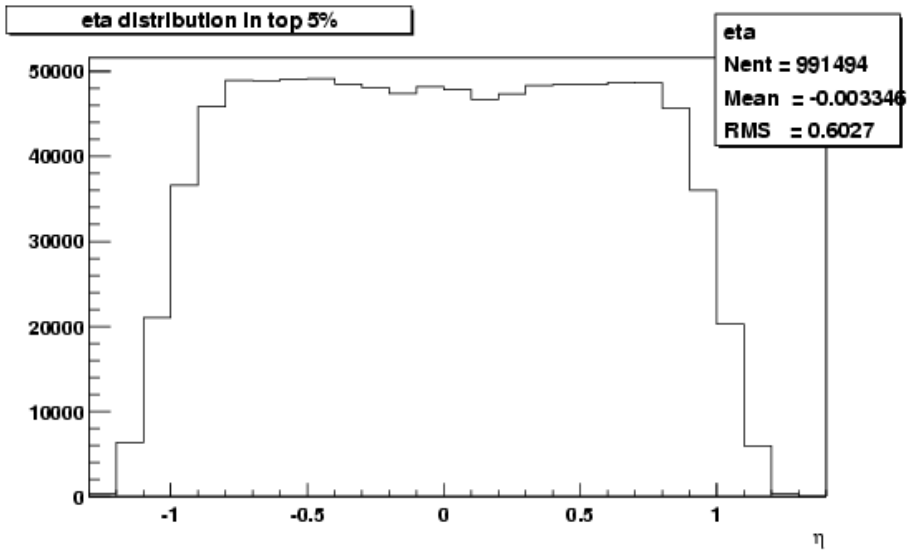
Efficiency vs pT



HIJING Pion Efficiency



Efficiency vs eta



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Flat for |eta|<0.75
Decrease faster than TPT

Conclusions

ITTF performs well!

- 97%→104% (ITTF/TPT) with pT>0.5GeV/c
  |eta|<0.75

Things to be tuned:

- Low pT Efficiency
- High eta Efficiency
- dEdx
- Track Quality Definition (chi2, dca?)