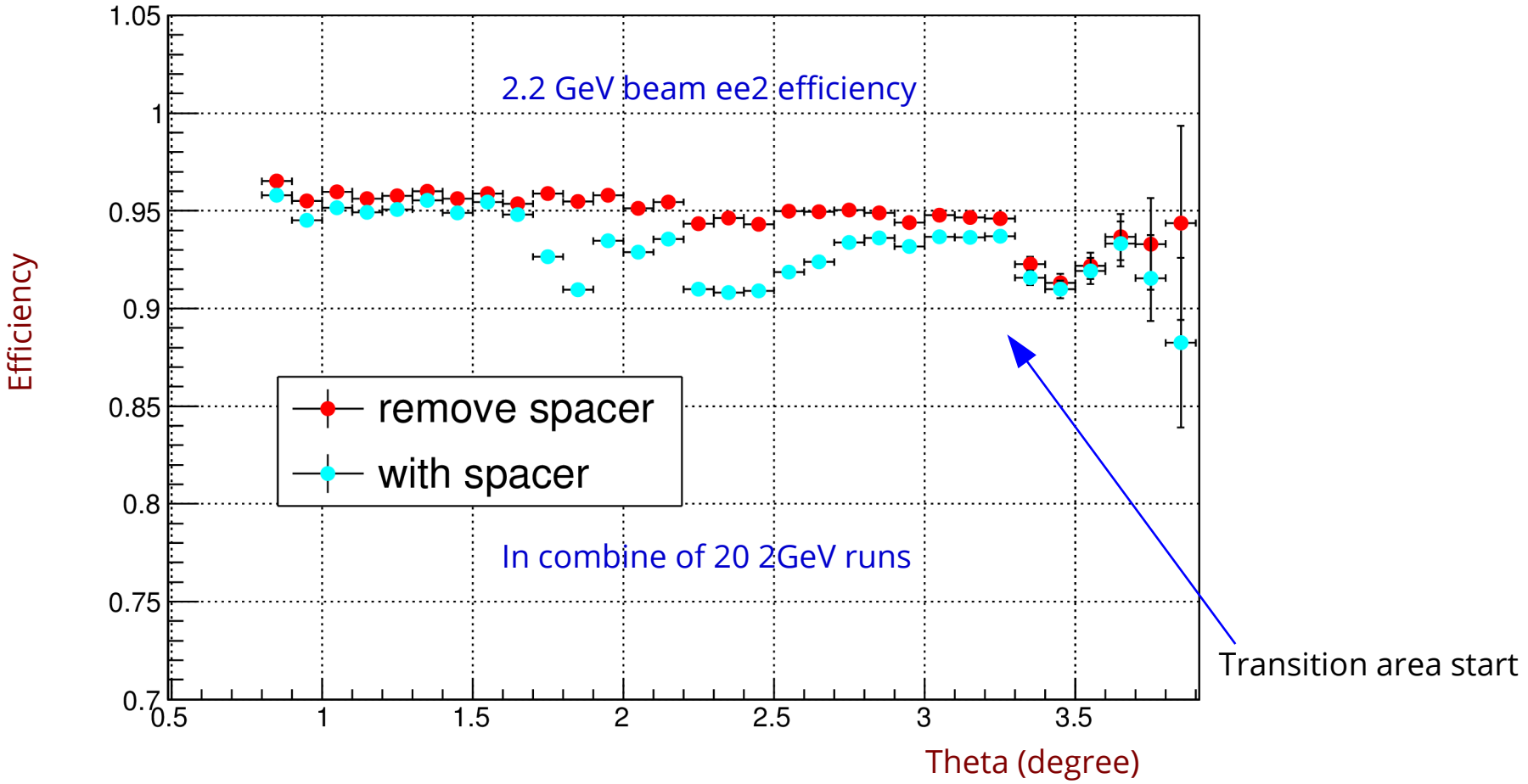
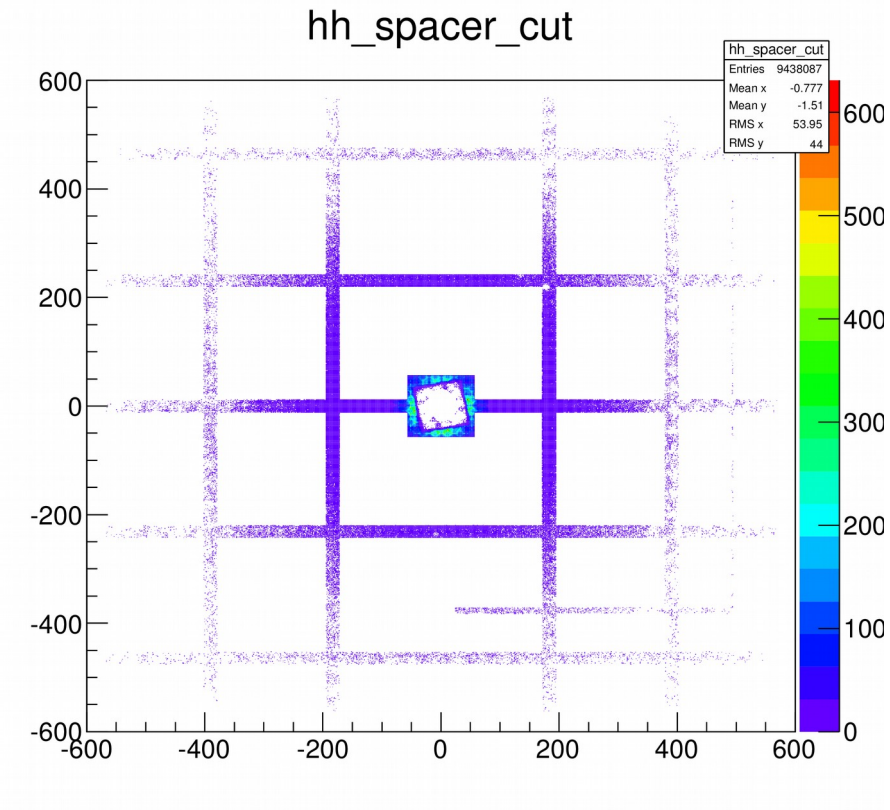
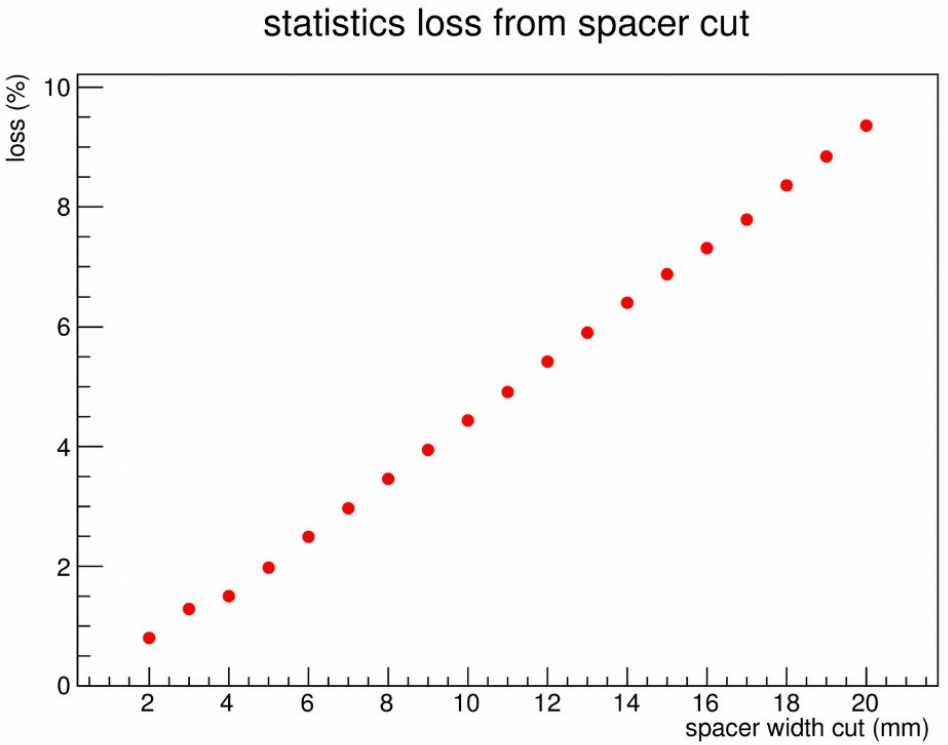
Spacer cut on GEM efficiency



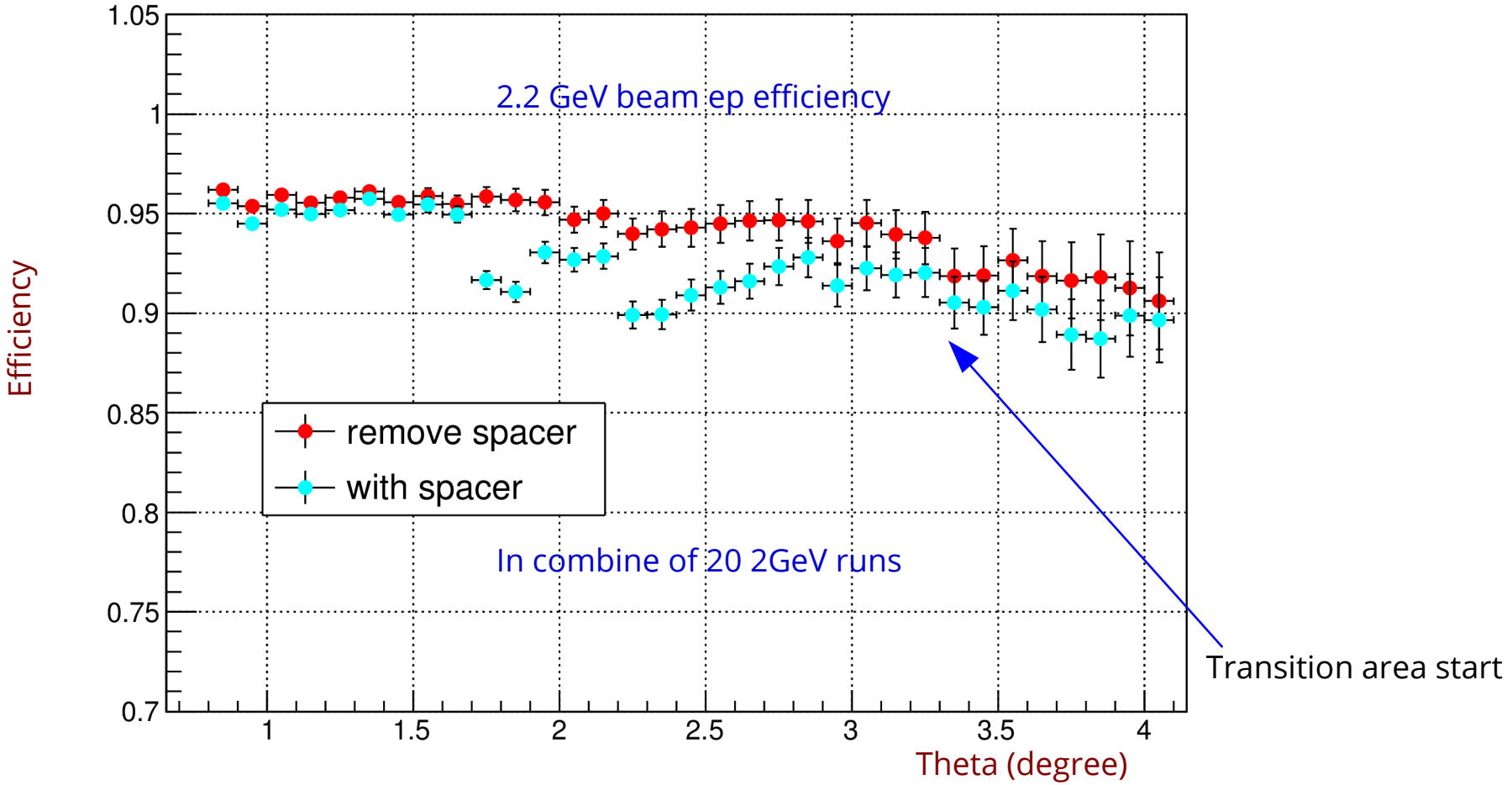
10 mm cut on spacer, ~4.7% data loss

Spacer cut on GEM efficiency



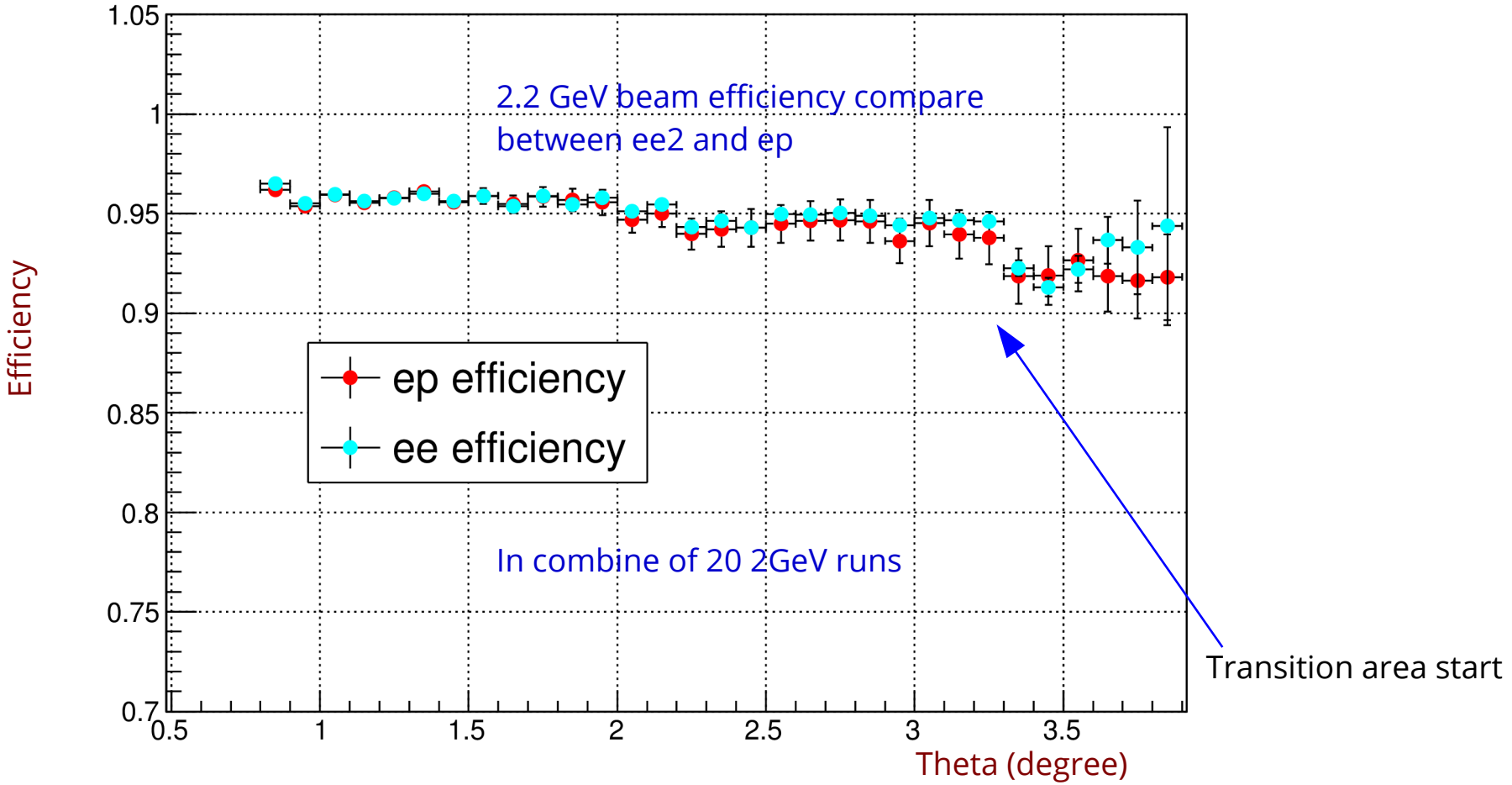


Spacer cut on GEM efficiency



10 mm cut on spacer, ~4.7% data loss

Spacer cut on GEM efficiency

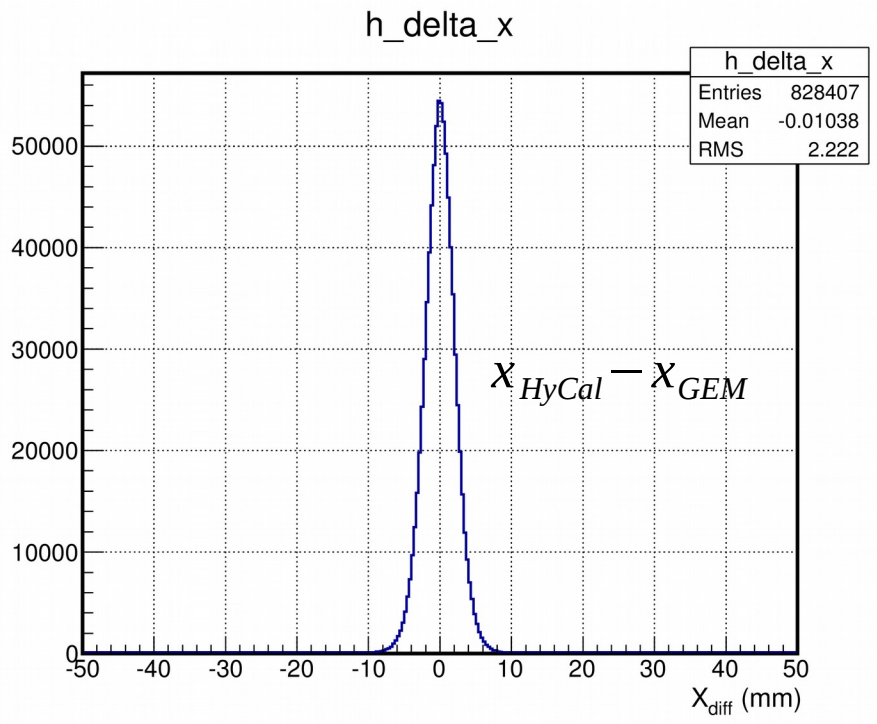


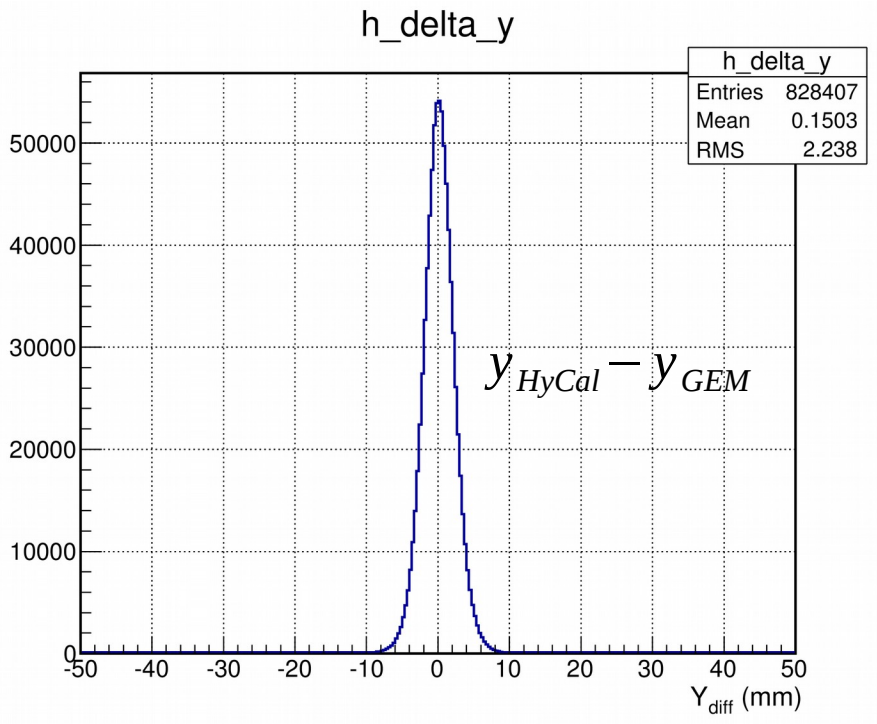
10 mm cut on spacer, ~4.7% data loss

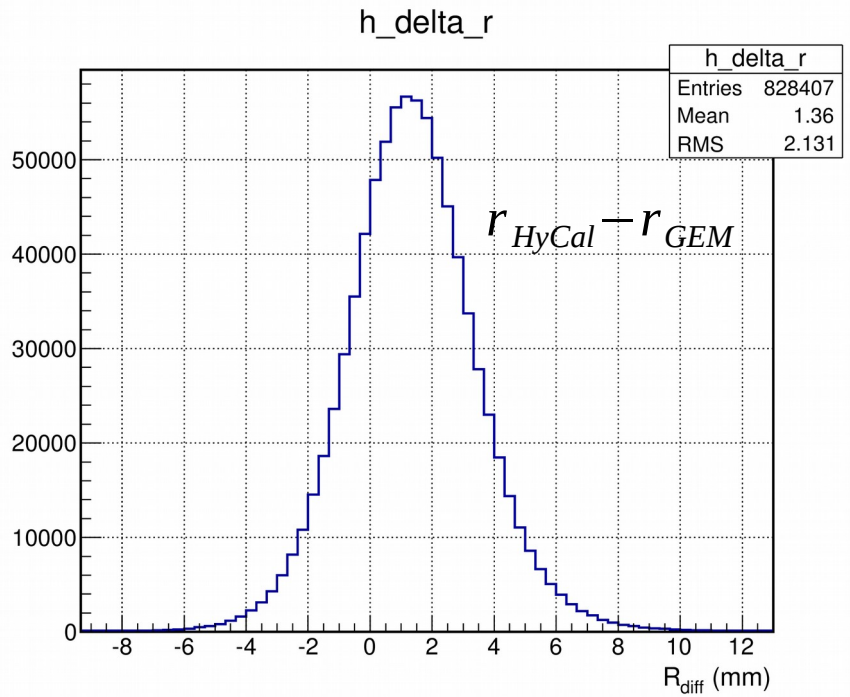
Matching between GEM and HyCal

- For each HyCal cluster, search closest GEM cluster within a circle range
- Searching radius = n X sigma (sigma = HyCal position resolution)

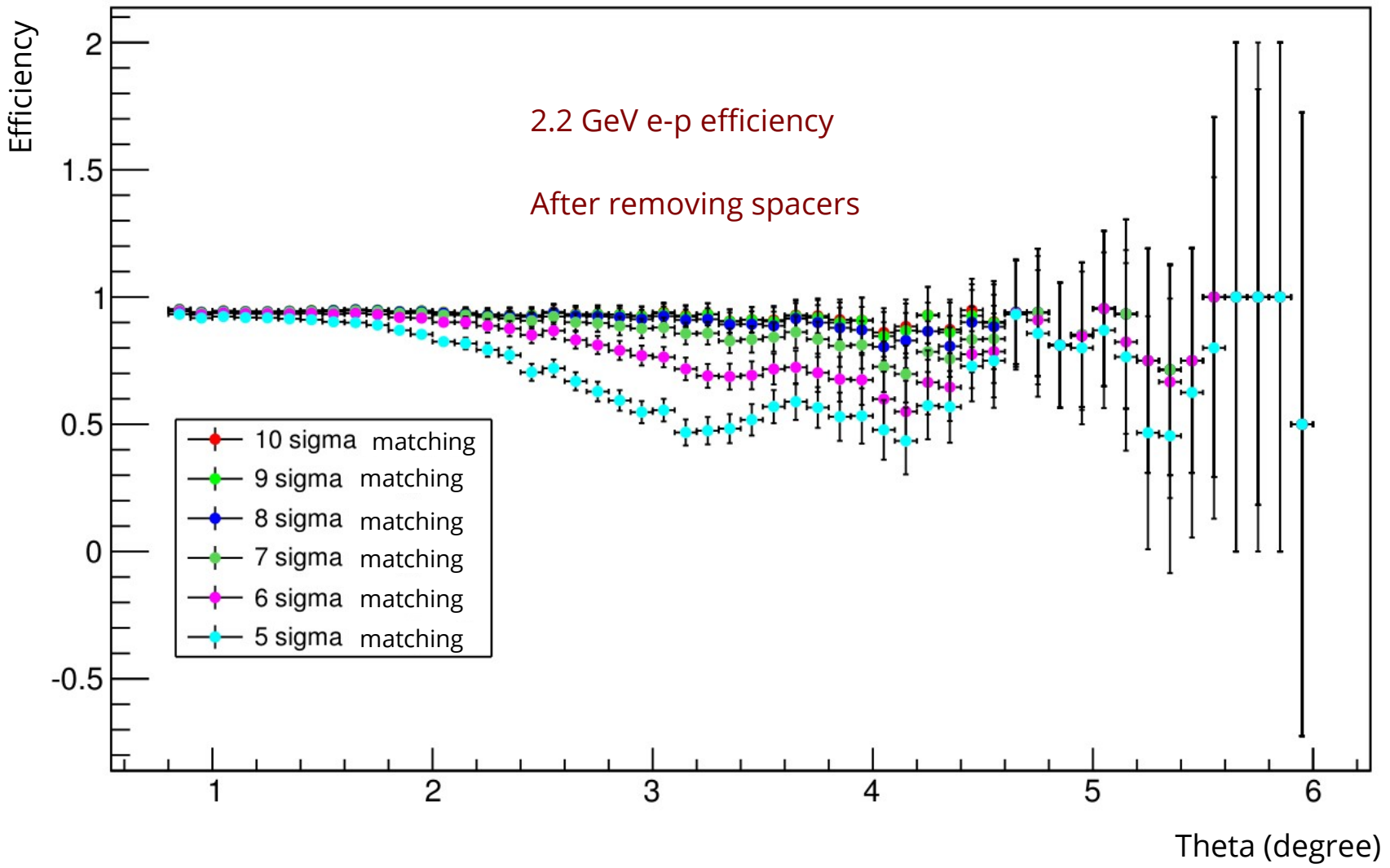
Match between GEM and HyCal



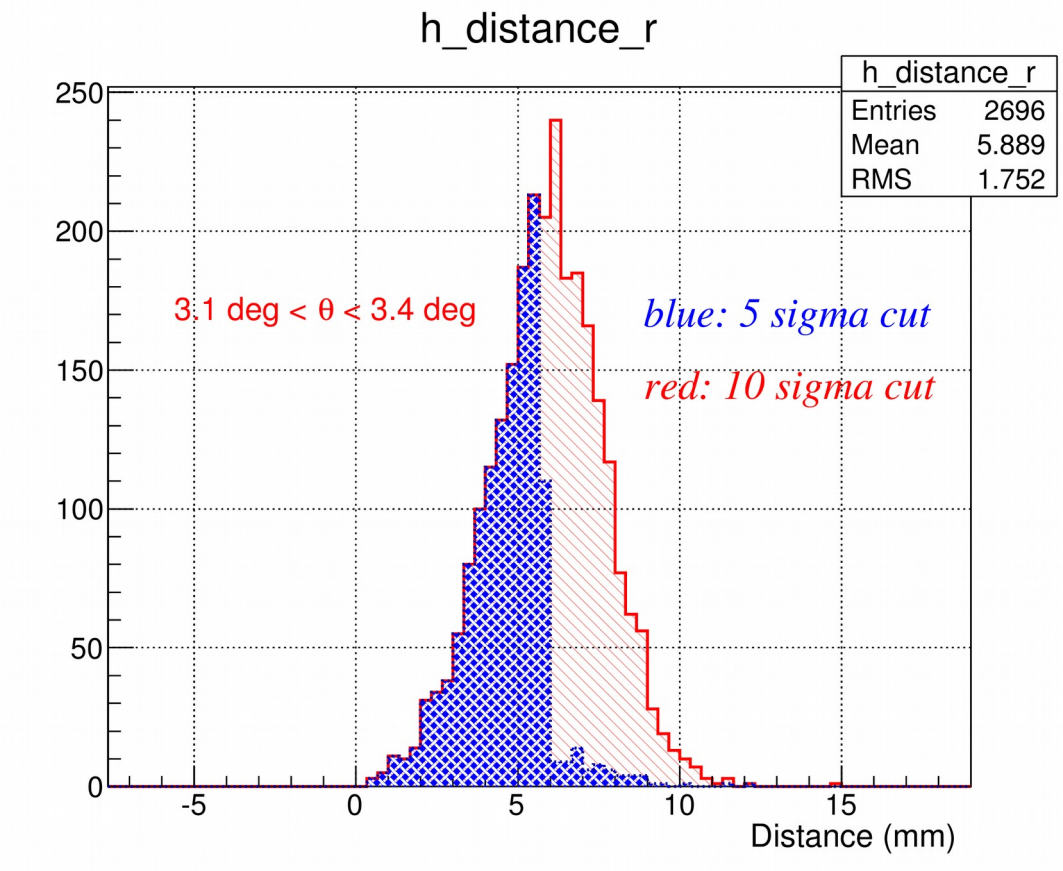




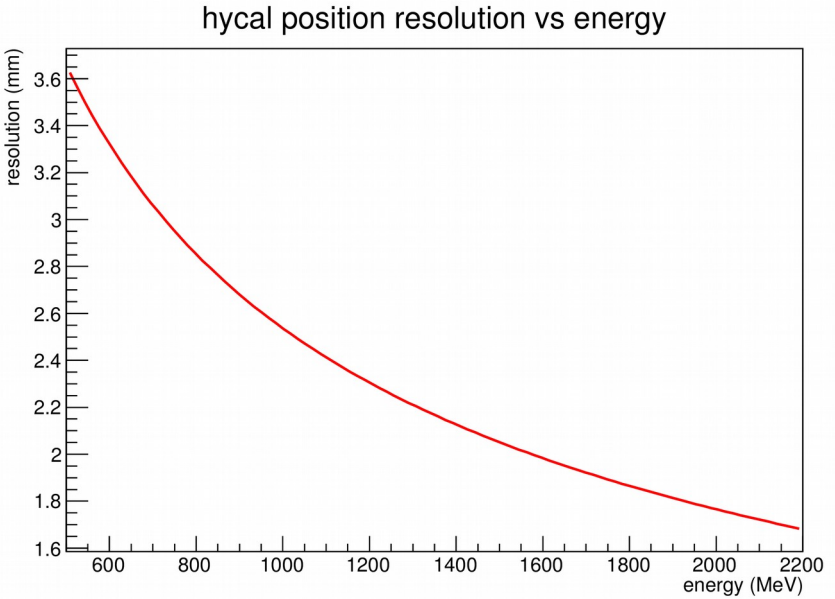
Matching radius on GEM efficiency



Matching radius on GEM efficiency



Efficiency drop due to different searching radius



HyCal position resolution

- Use constant HyCal position resolution
- Or increase sigma cut