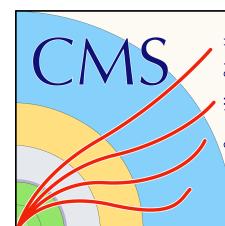


HEP NTUA

Weekly Report

7/7/2021

George Bakas



Summary

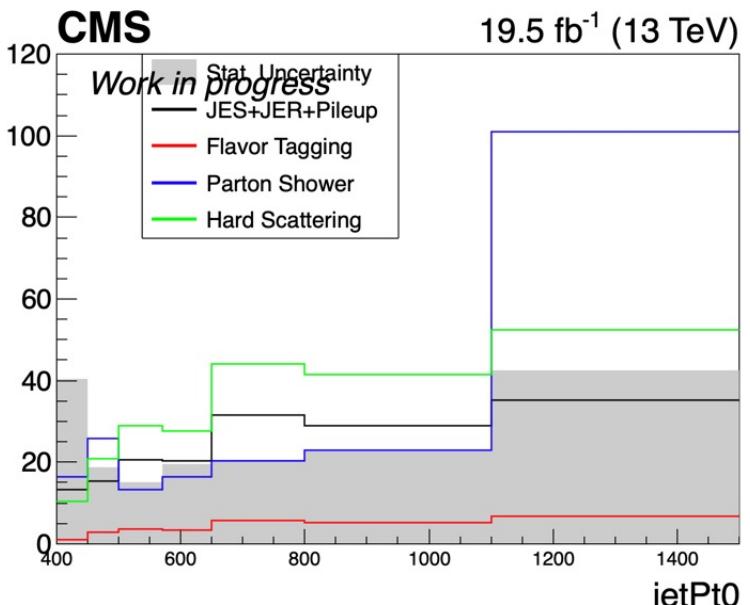
- ttX analysis:
 - Still haven't got all the files → 2016_preVFP just arrived
 - Signal Extraction → We have minor differences with Giannis but we want to make sure we have exactly the same output
 - Combination of all years in Fiducial level
 - Unfolding
 - Show systematic variations after unfolding for Parton and Particle levels
 - Combination of each variation in fiducial
 - Unfolding for each combined variation → combination of acceptance/efficiency and responses
 - Planning a ttX presentation for next week
- Z' analysis
 - Combination of datacards
 - Result on all channels (years)
 - Mass Cut Mapping :

```
{"mZ_1200_12":1000, "mZ_1400_14":1200, "mZ_1600_16":1400, "mZ_1800_18":1600, "mZ_2000_20":1600,
  "mZ_2500_25":2000, "mZ_3000_30":2000, "mZ_3500_35":2000, "mZ_4000_40":2000, "mZ_4500_45":2000}
```
 - Expectation Ratio (over 2018 result for example as reference) in order to check consistency of combined result

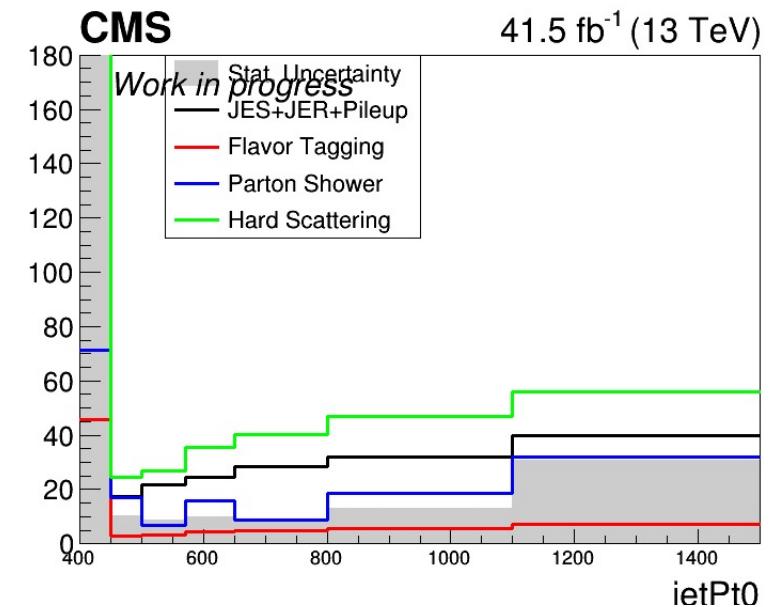


Errors in Particle Level (Work In Progress)

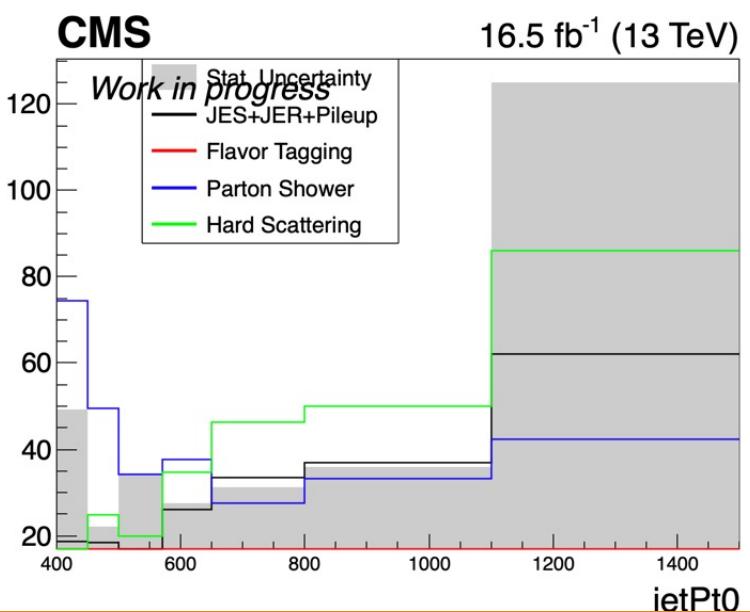
2016_preVFP



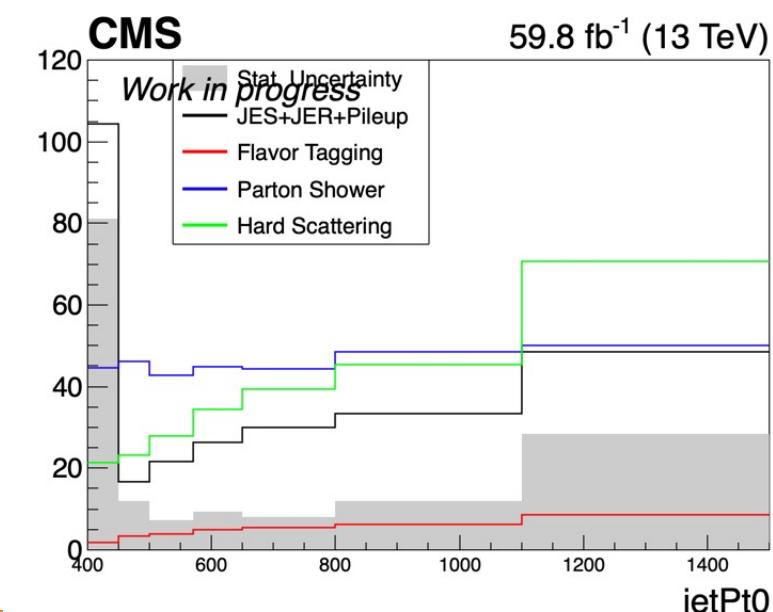
2017



2016_postVFP

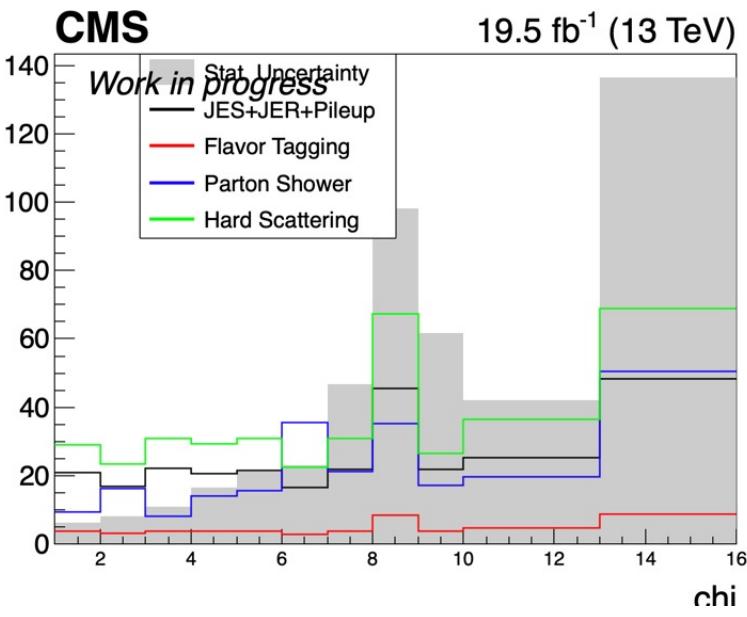


2018

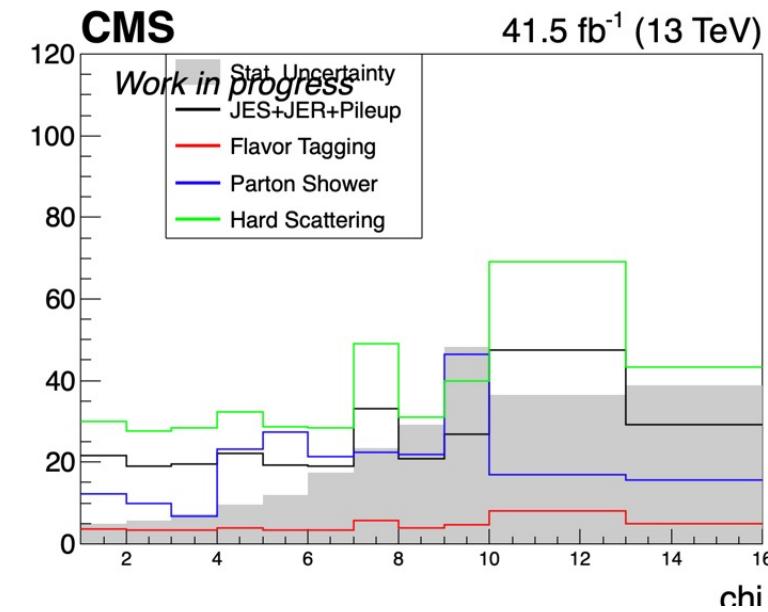


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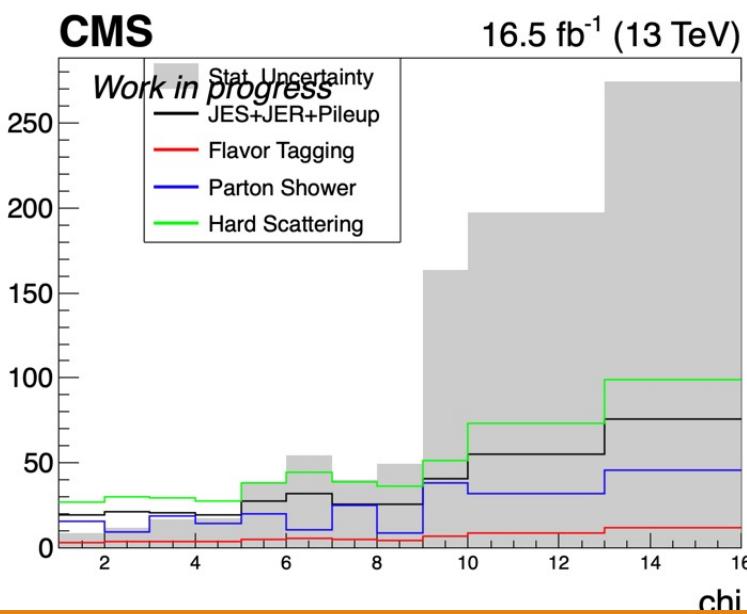
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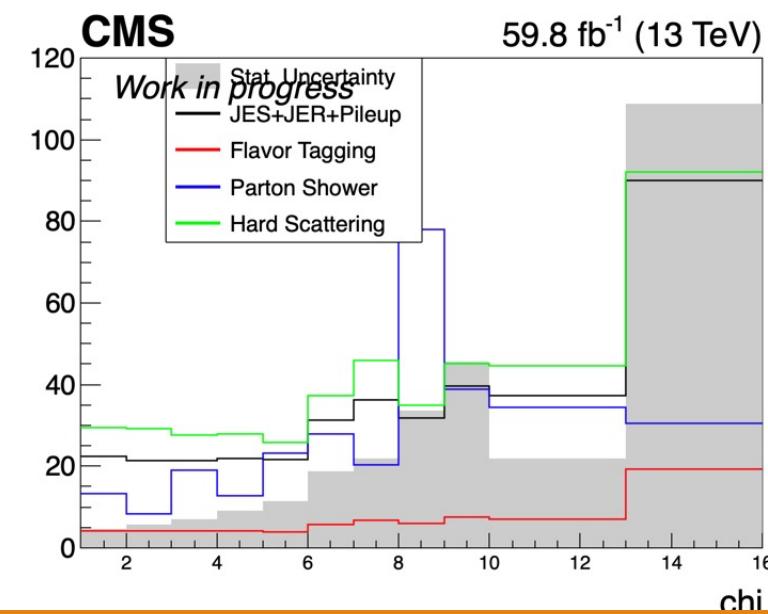
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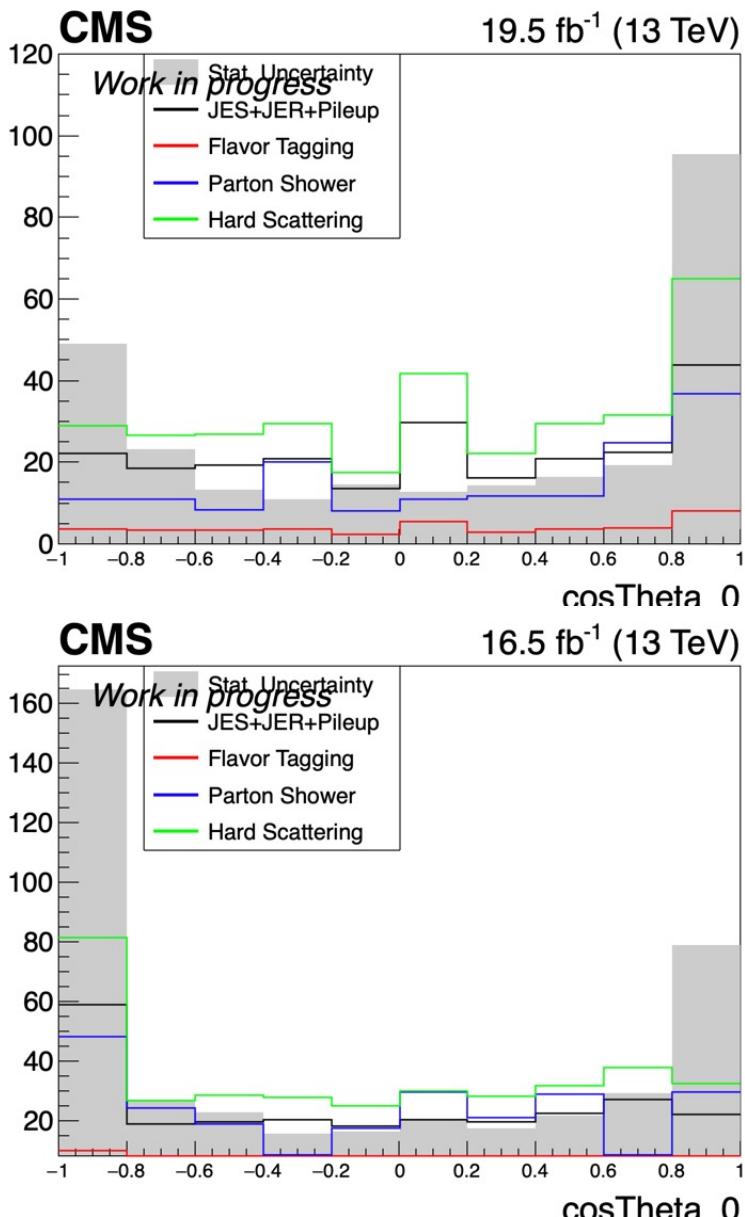


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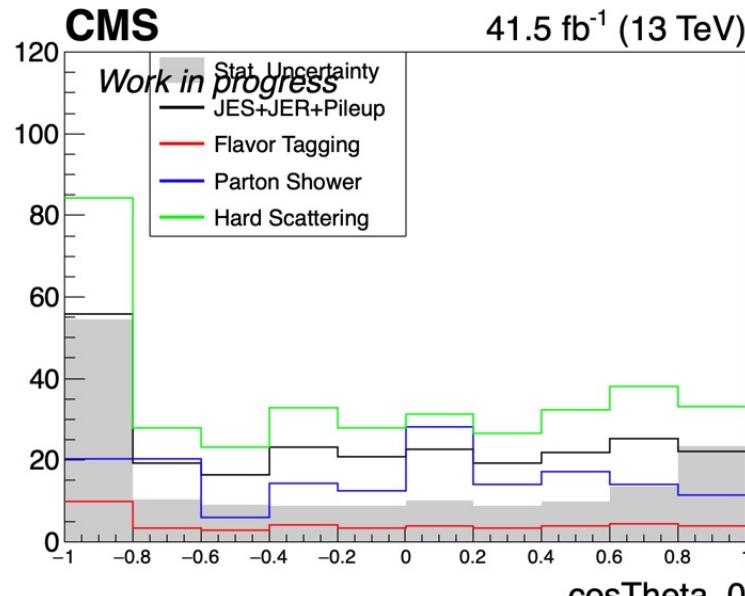


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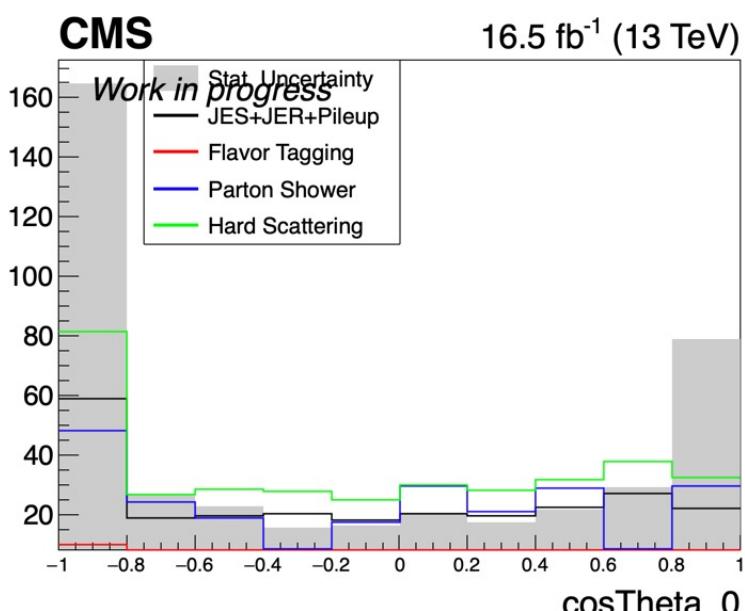
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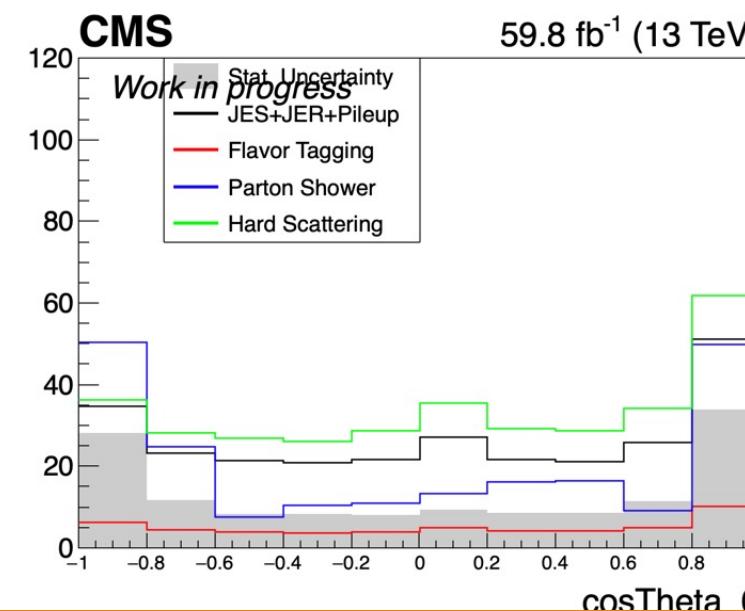
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2016_postVFP

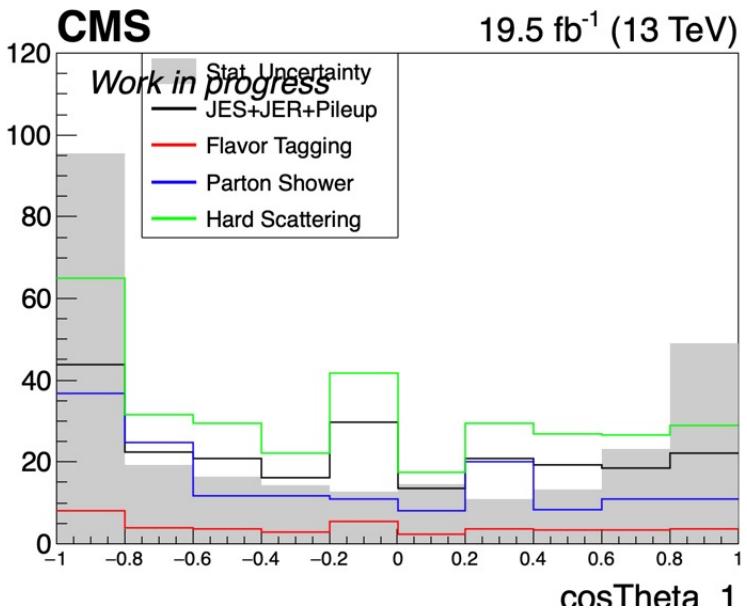


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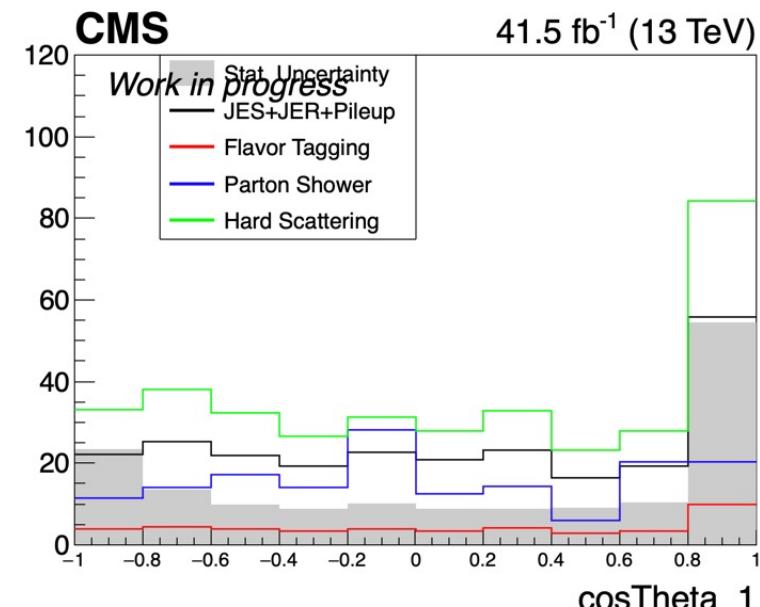


Errors in Particle Level (Work In Progress)

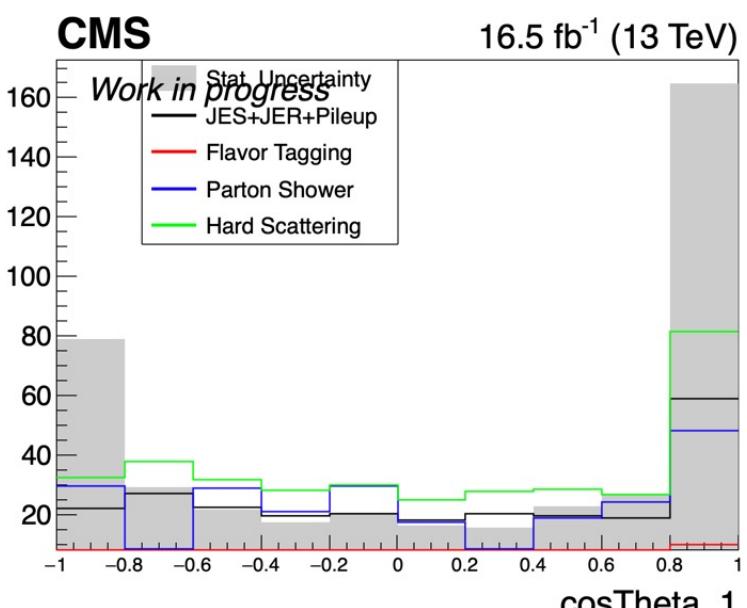
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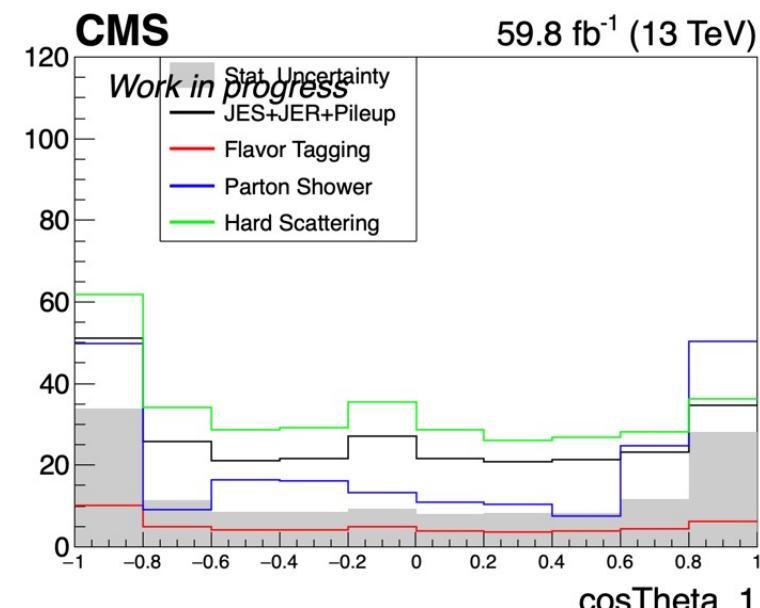
2017



2016_postVFP



2018

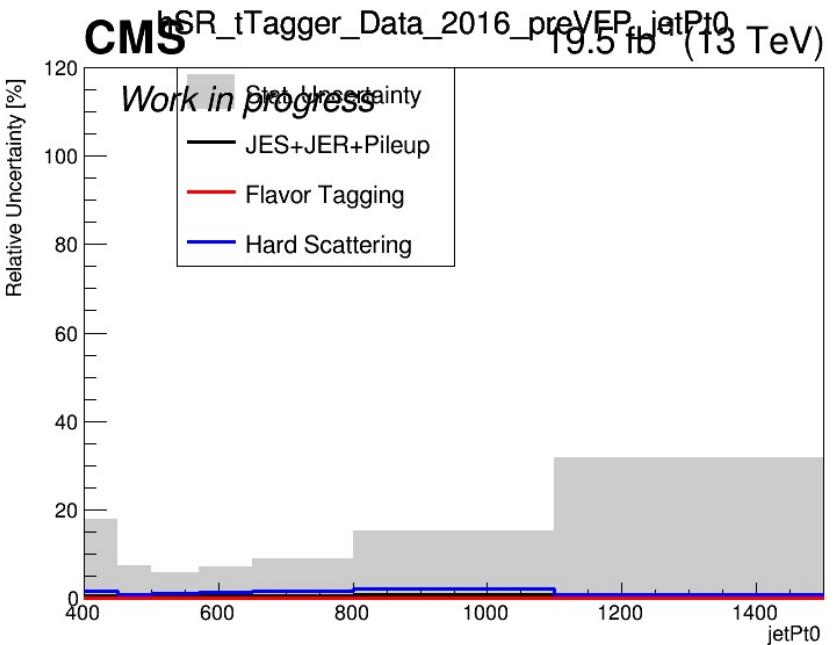


BACKUP

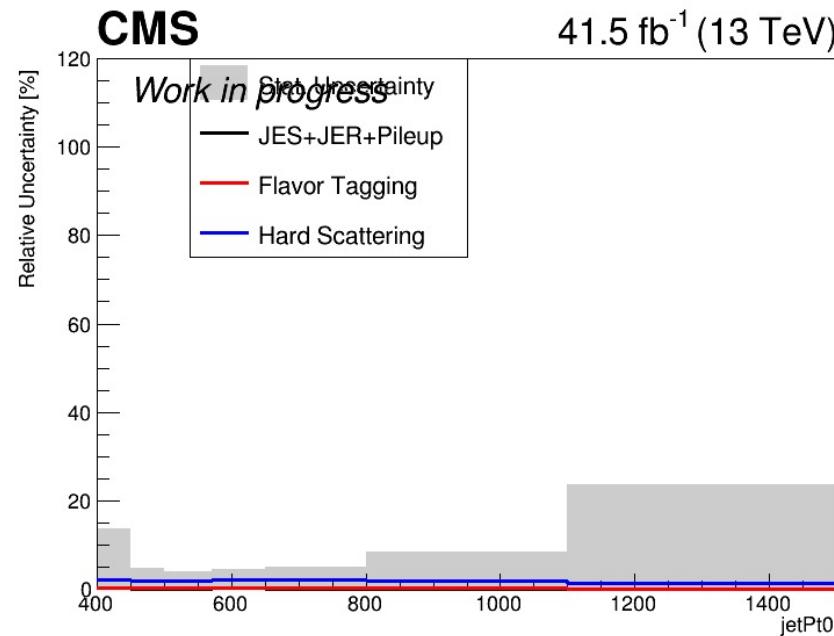


Errors in Fiducial Signal Extraction (Work In Progress)

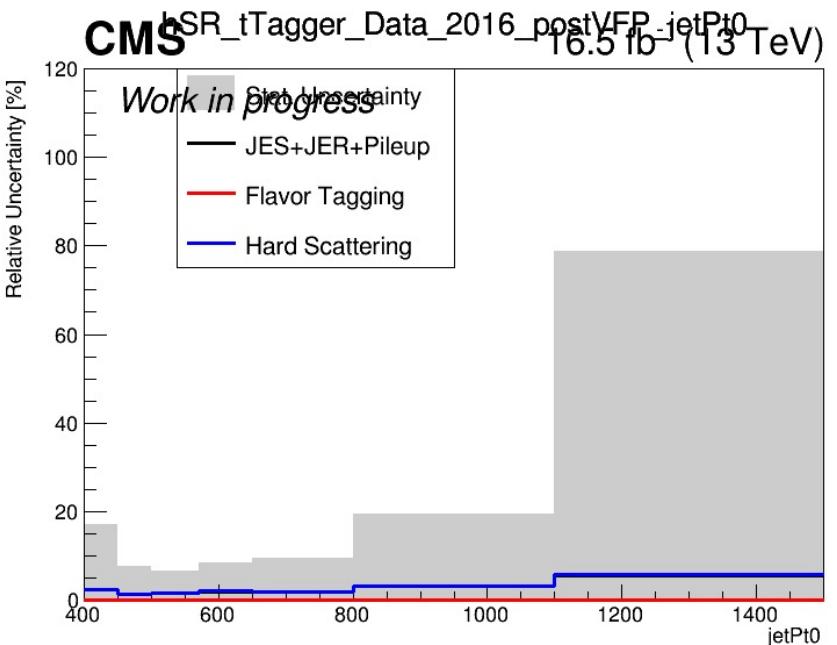
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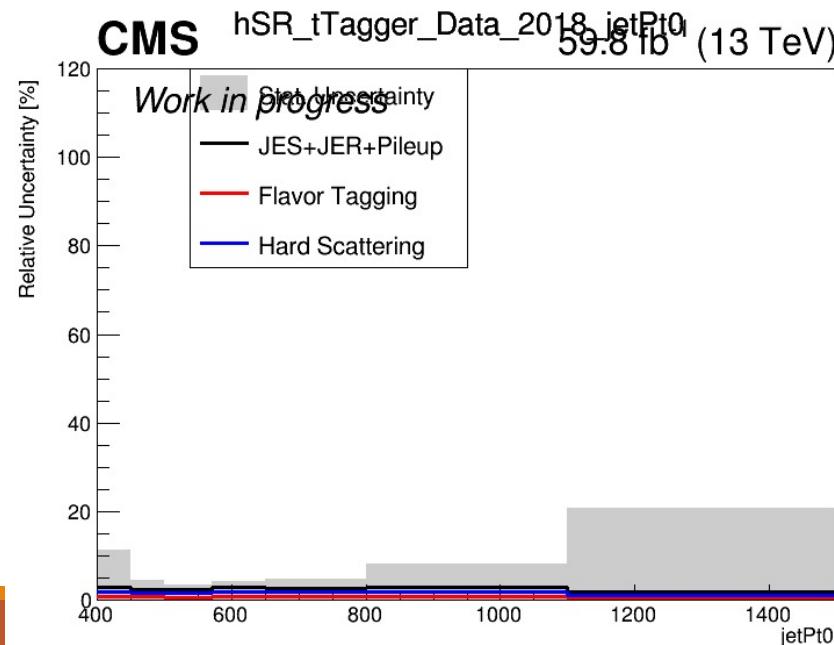
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2016_postVFP

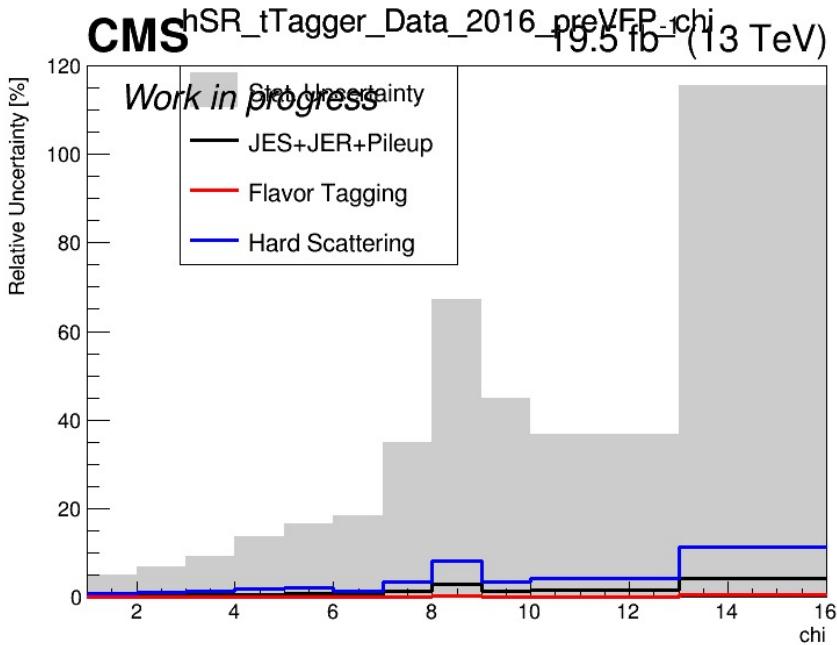


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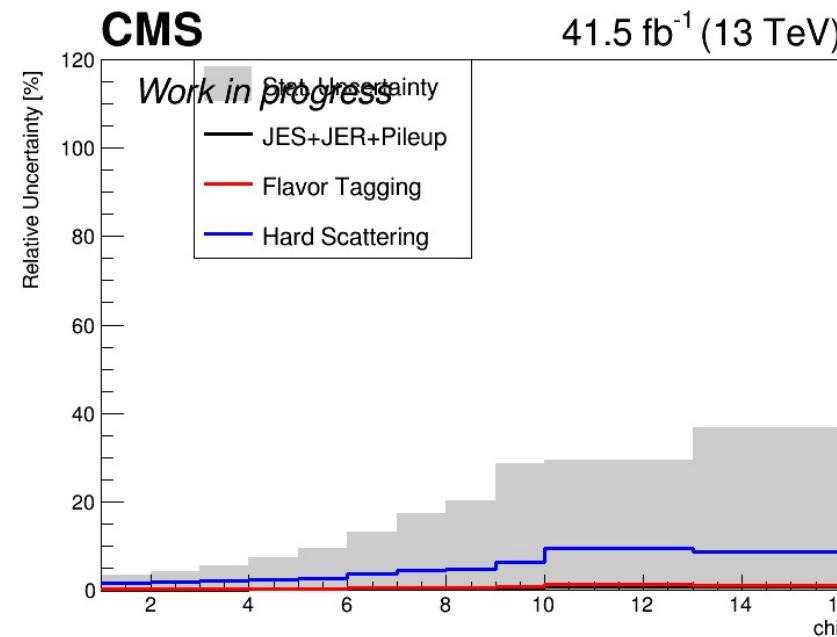


Errors in Fiducial Signal Extraction (Work In Progress)

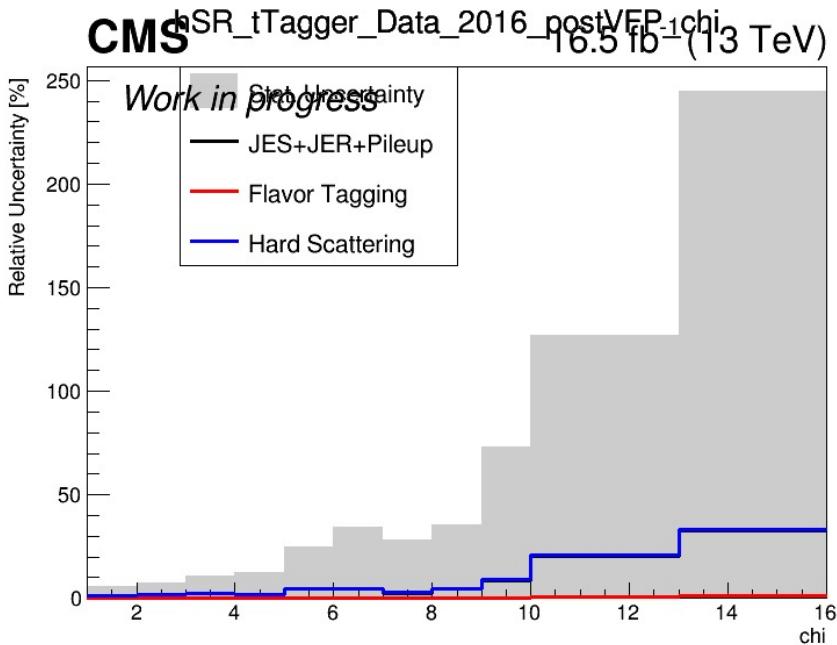
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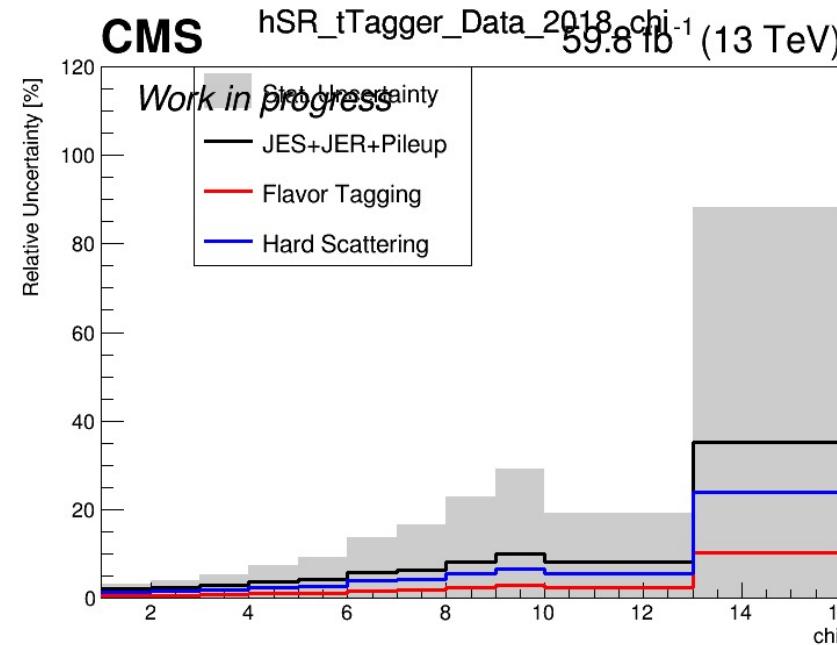
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2016_postVFP

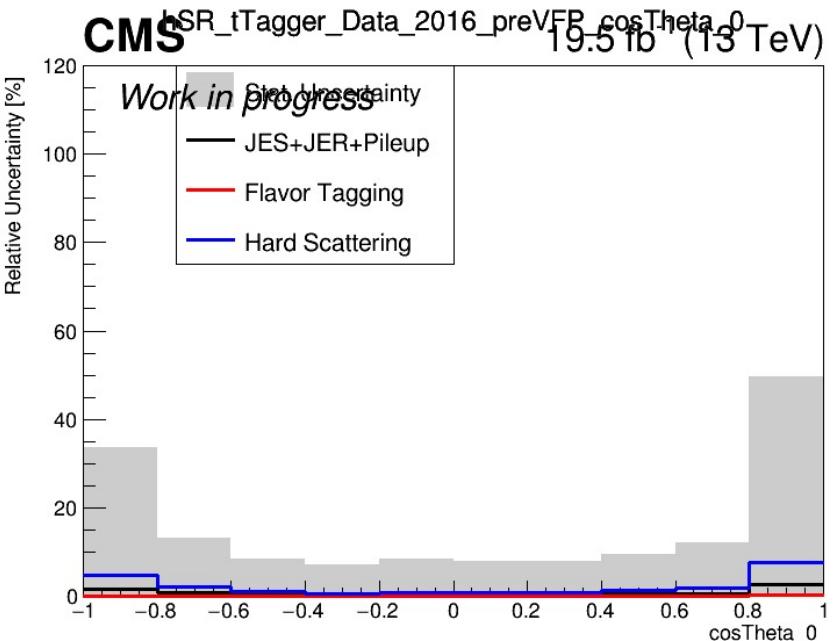


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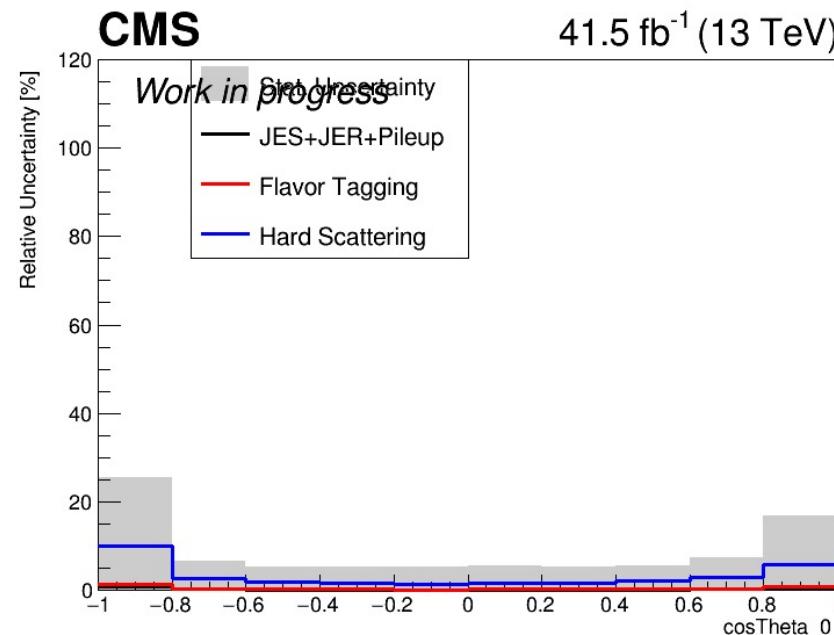


Errors in Fiducial Signal Extraction (Work In Progress)

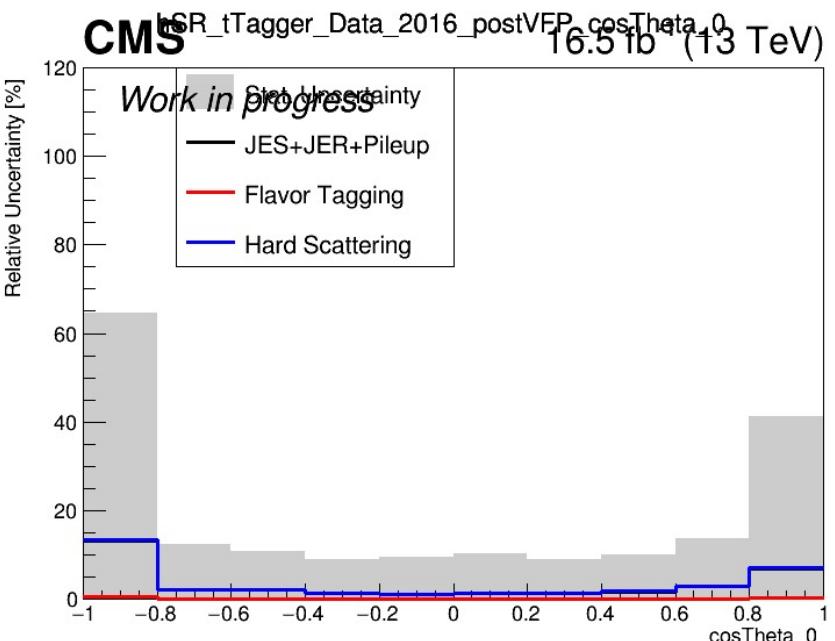
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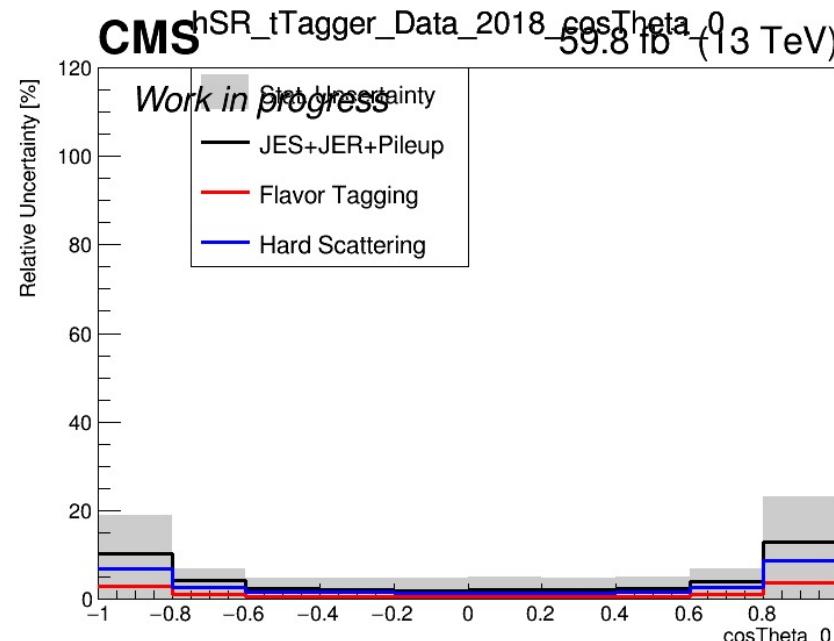
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2016_postVFP

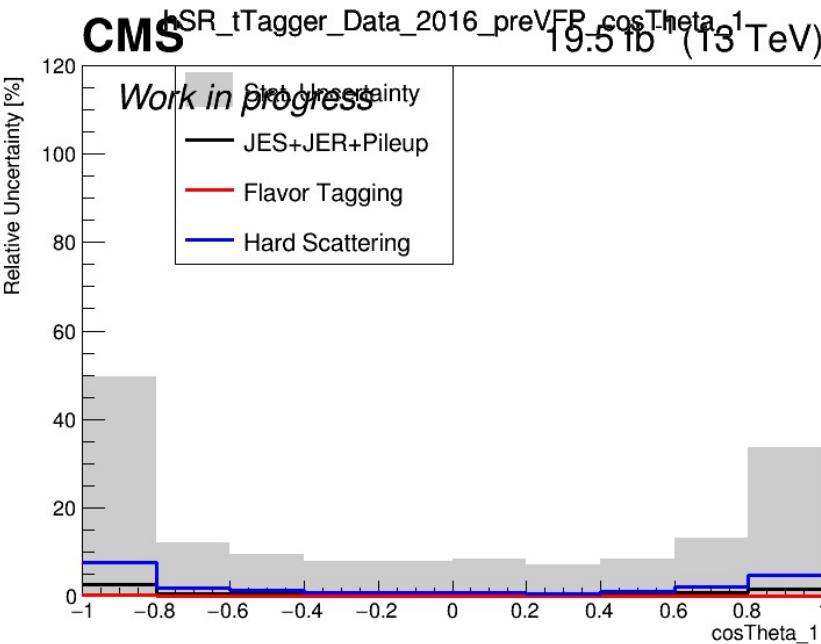


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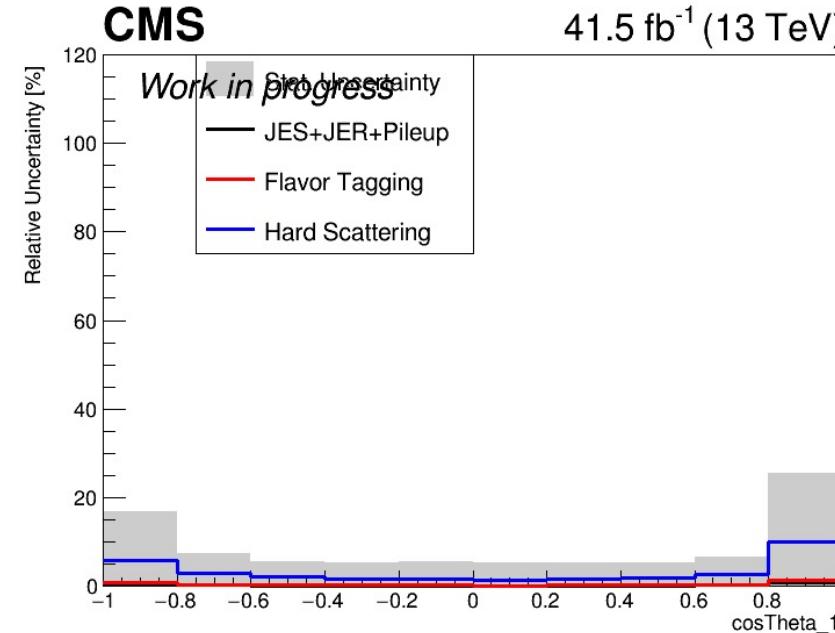


Errors in Fiducial Signal Extraction (Work In Progress)

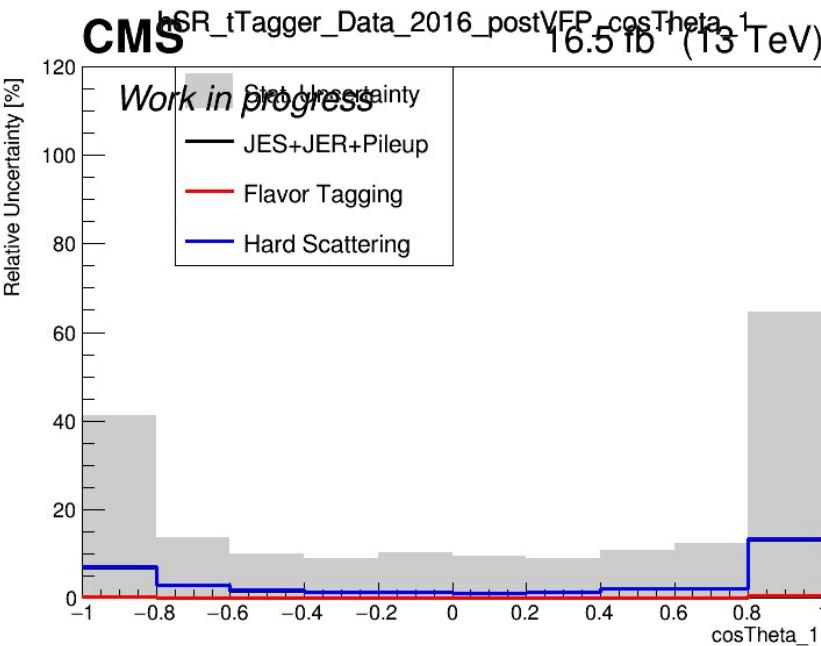
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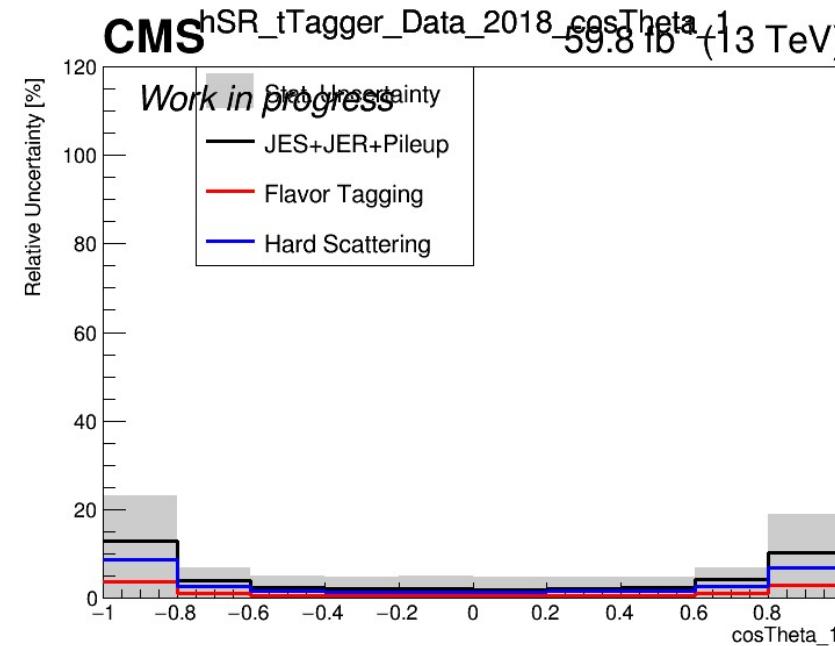
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2016_postVFP

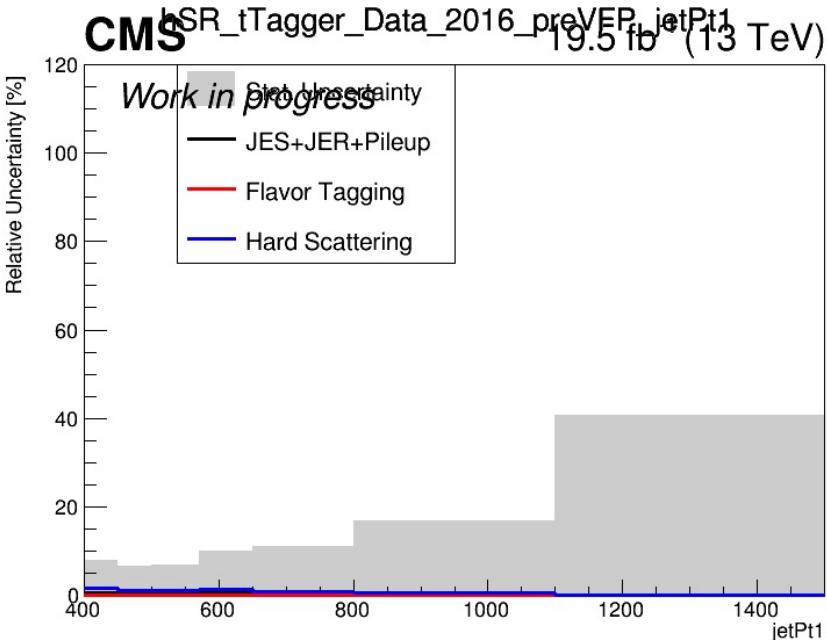


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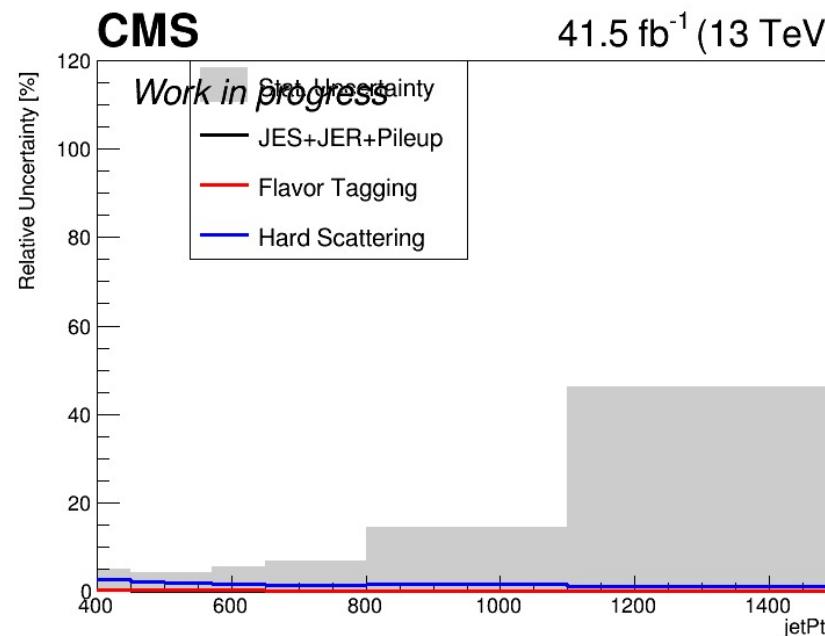


Errors in Fiducial Signal Extraction (Work In Progress)

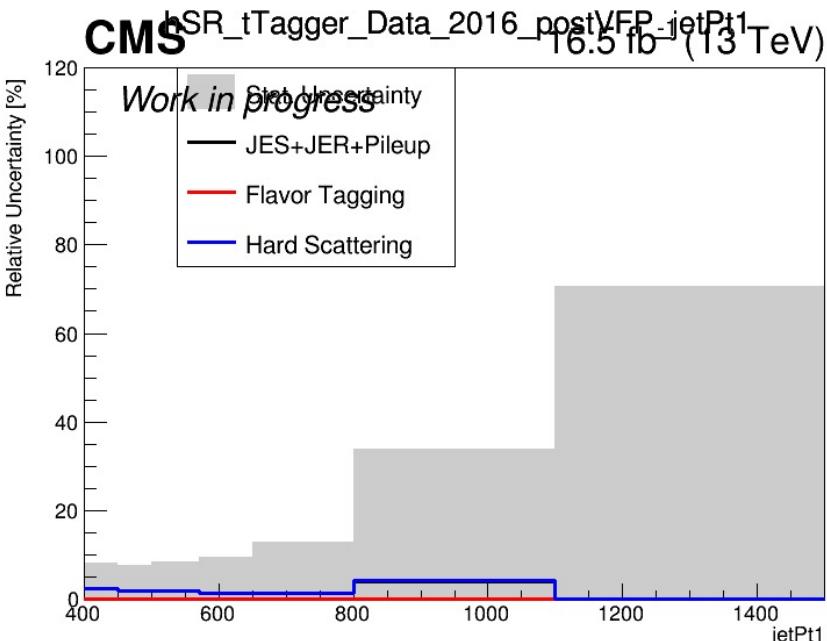
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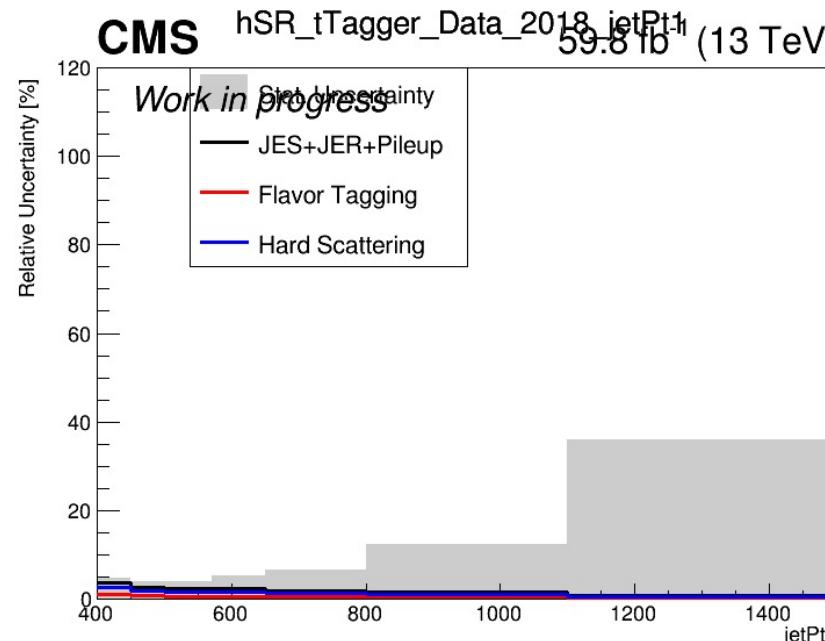
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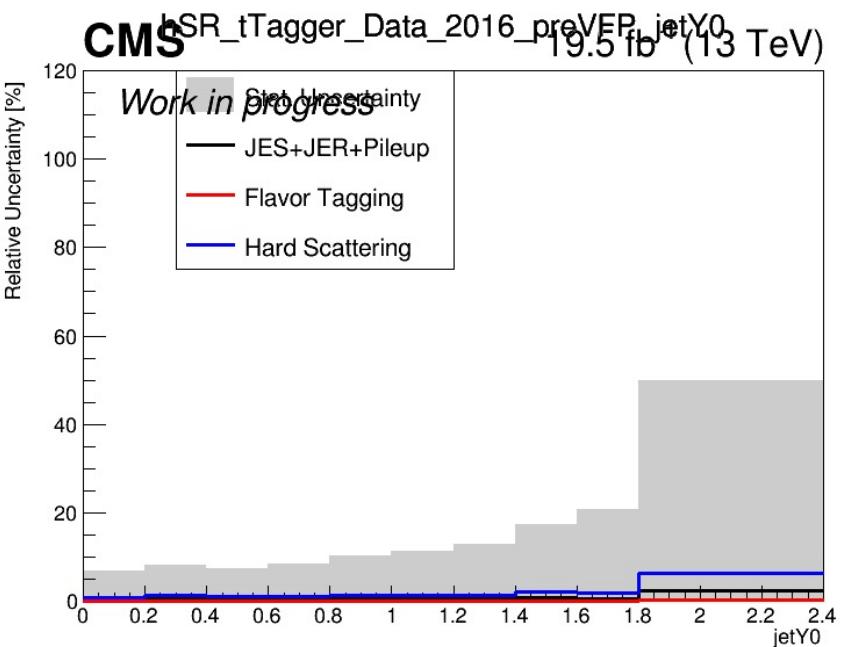


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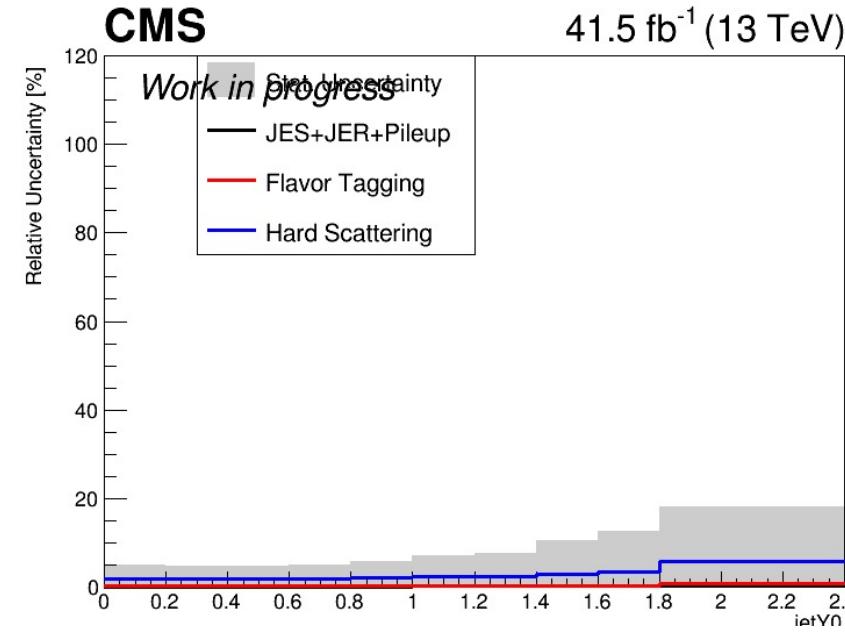


Errors in Fiducial Signal Extraction (Work In Progress)

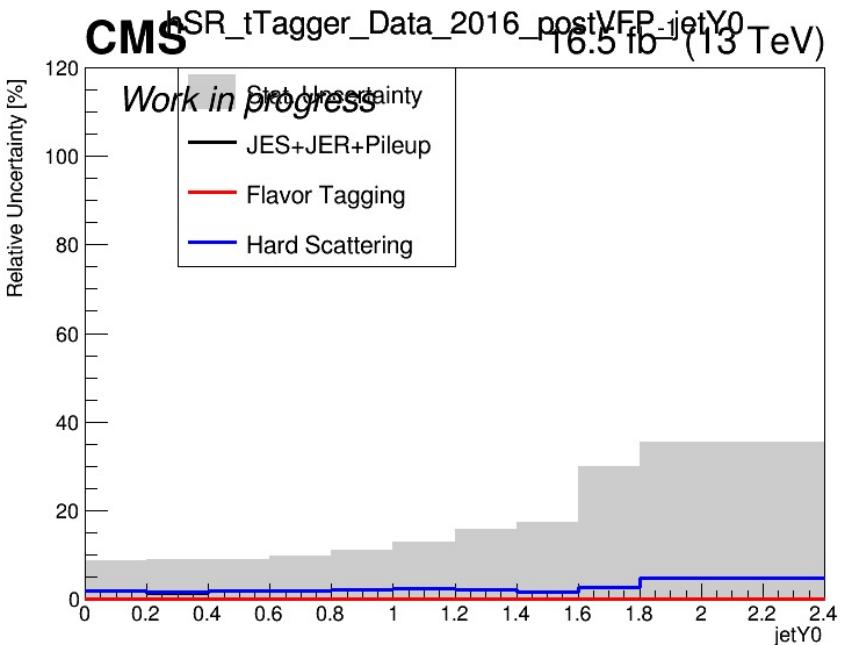
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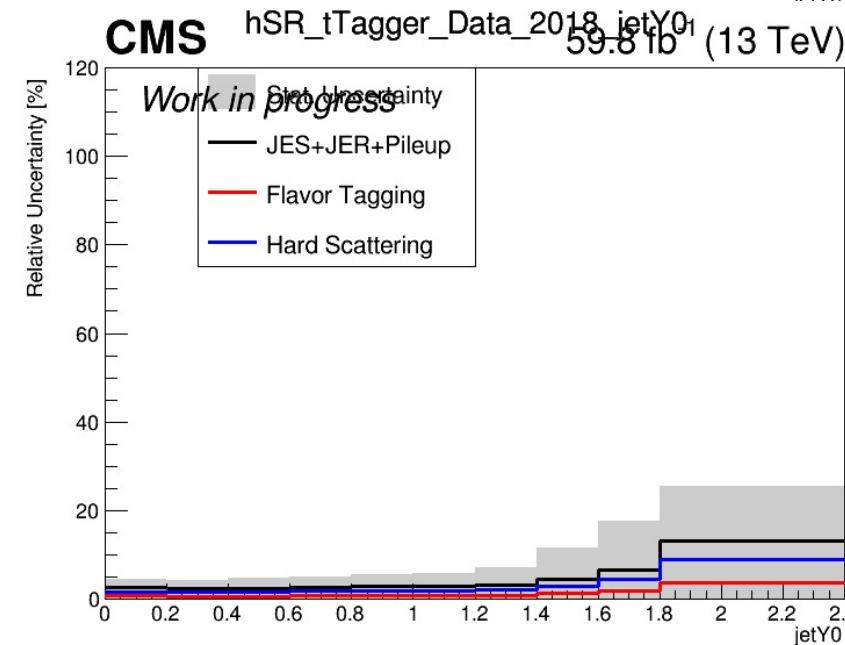
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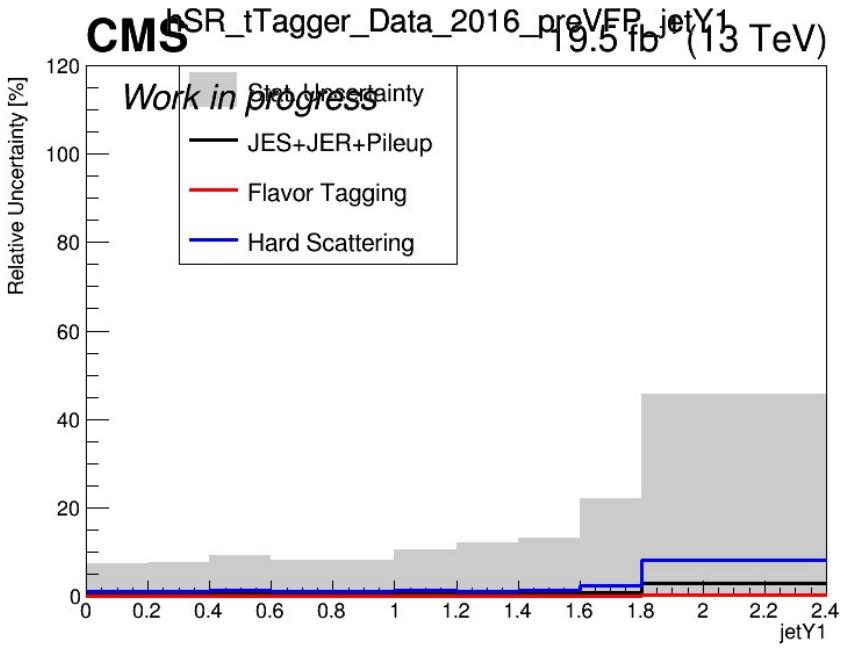


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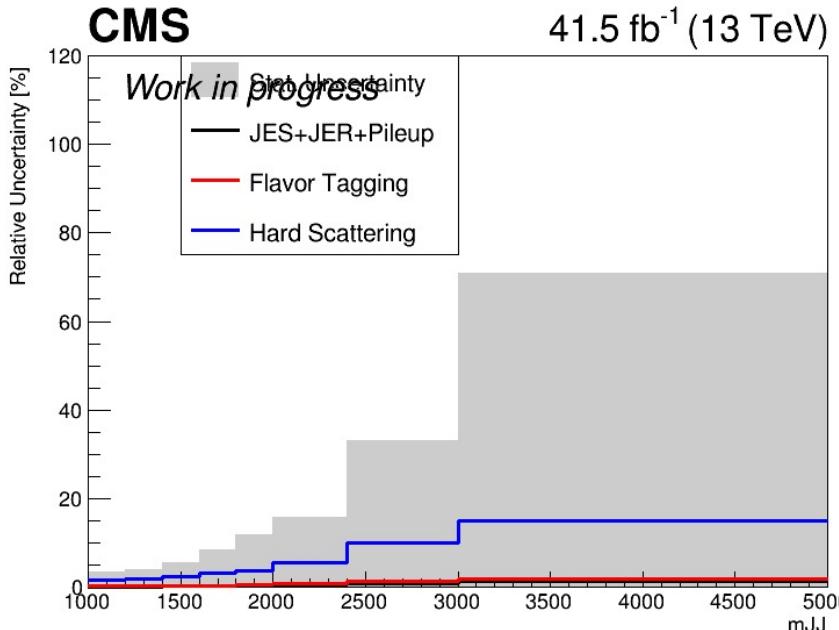


Errors in Fiducial Signal Extraction (Work In Progress)

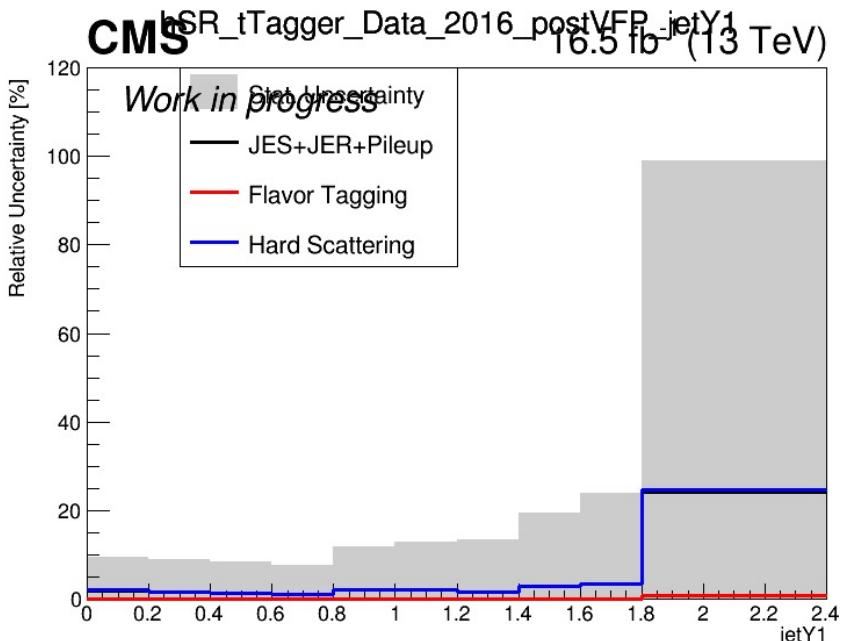
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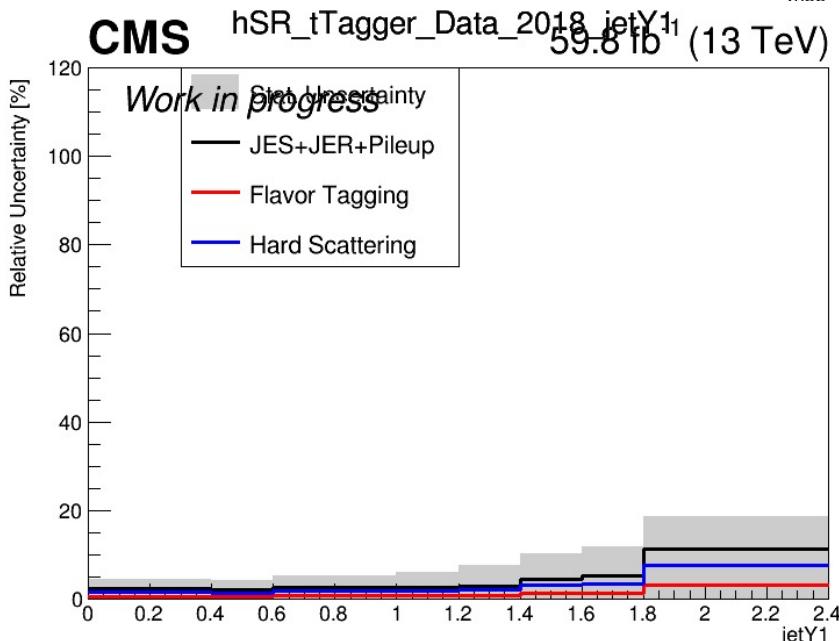
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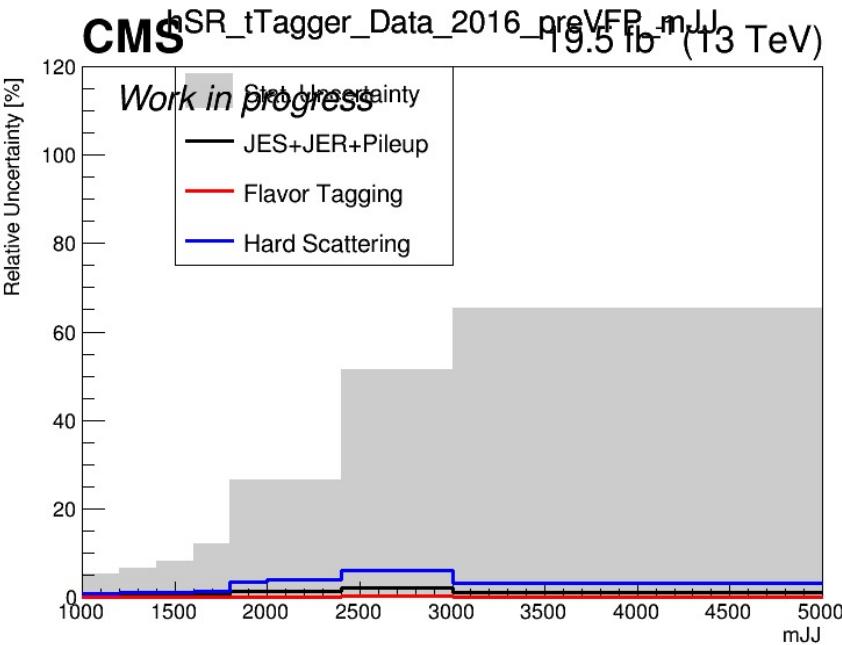


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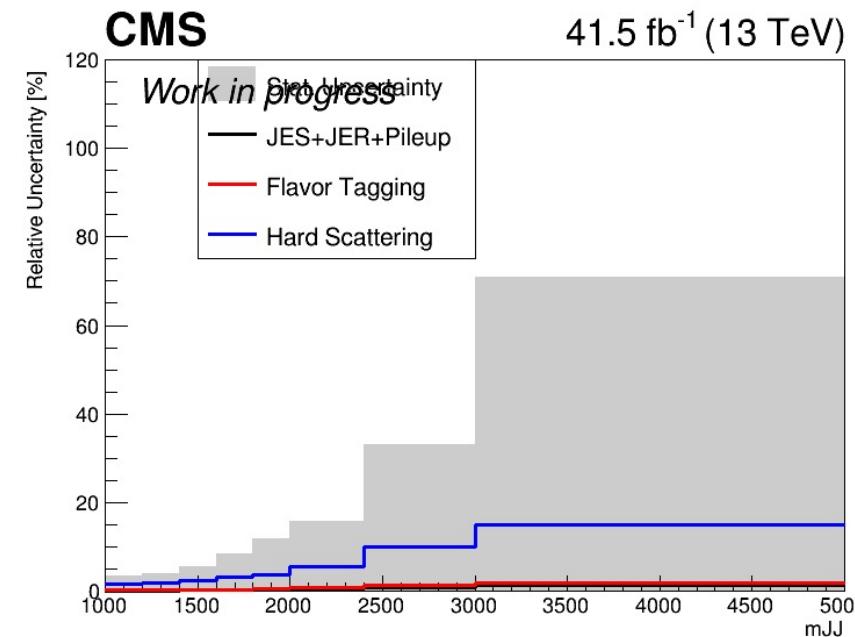


Errors in Fiducial Signal Extraction (Work In Progress)

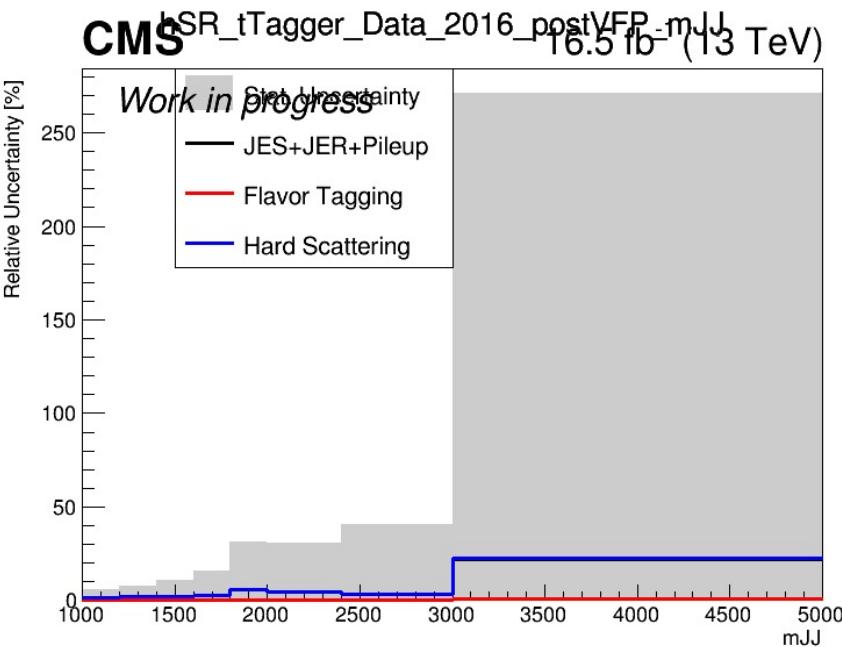
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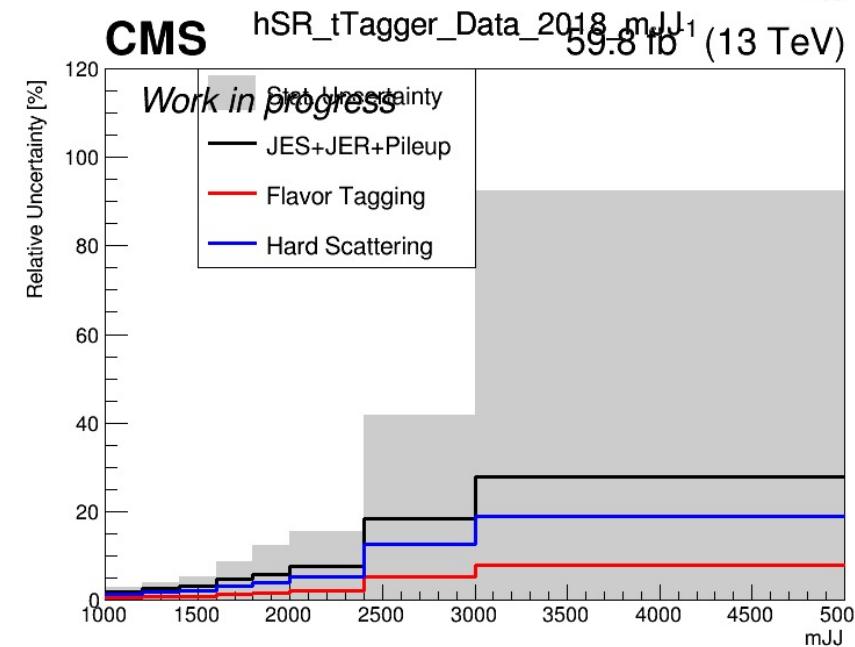
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2016_postVFP

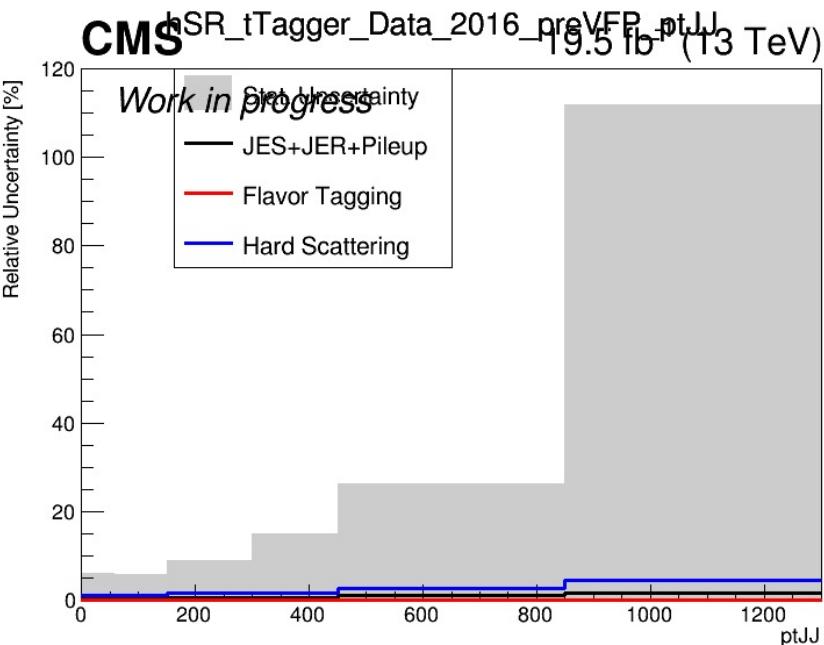


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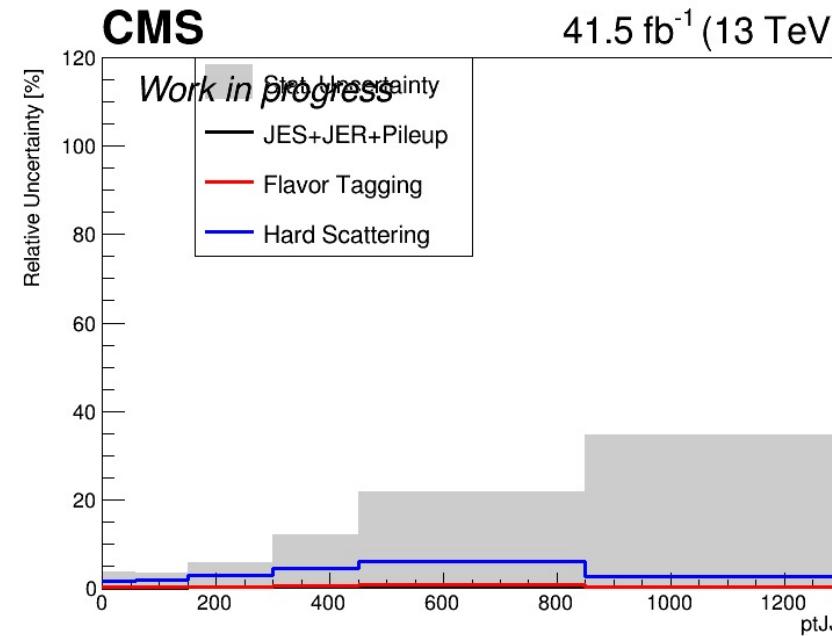


Errors in Fiducial Signal Extraction (Work In Progress)

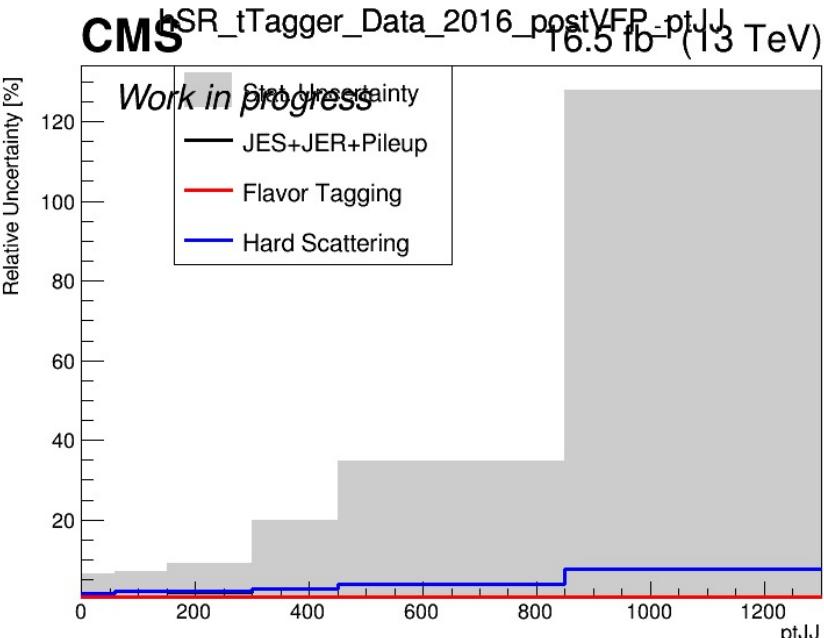
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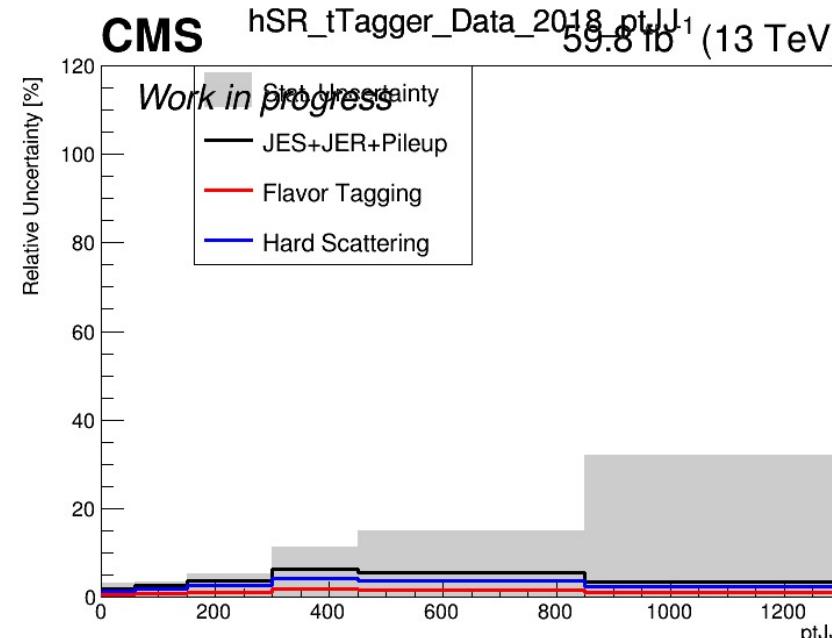
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2016_postVFP

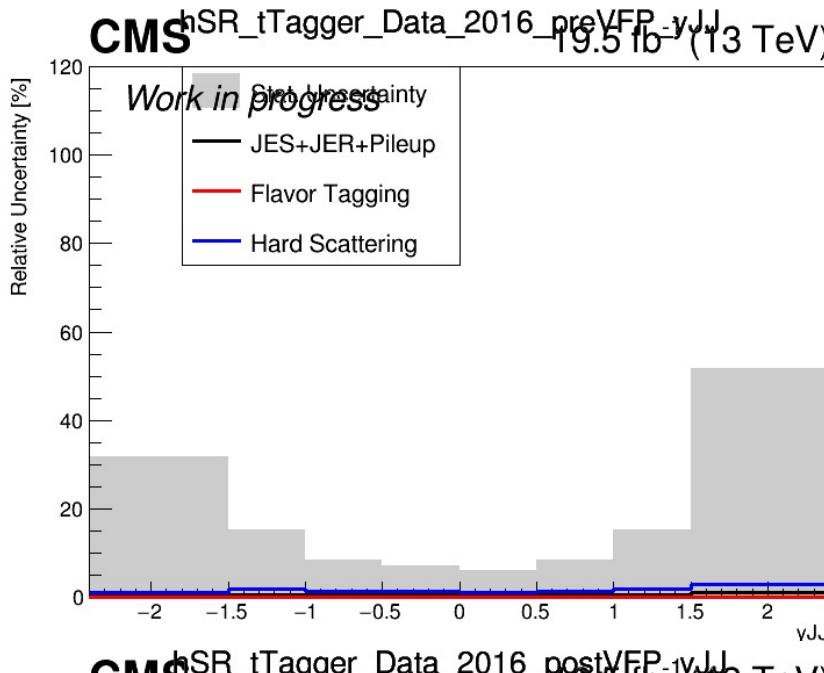


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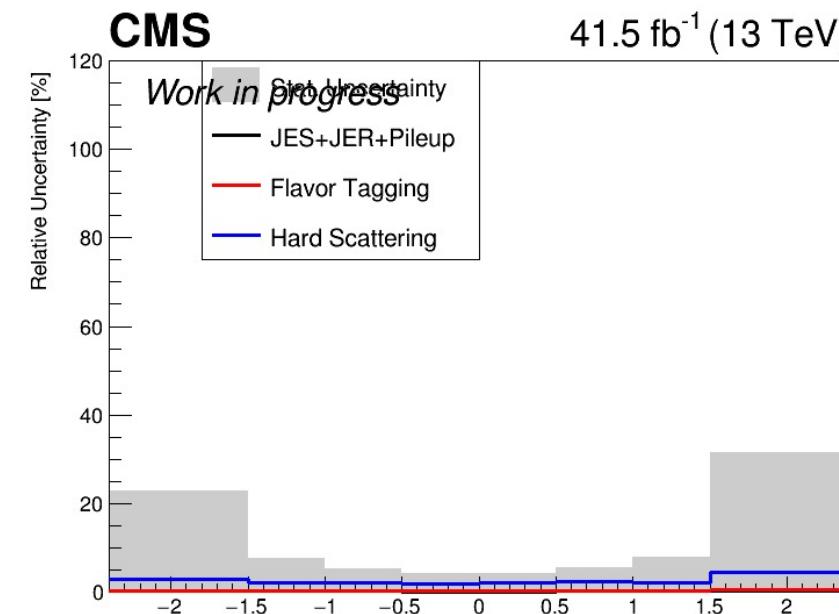


Errors in Fiducial Signal Extraction (Work In Progress)

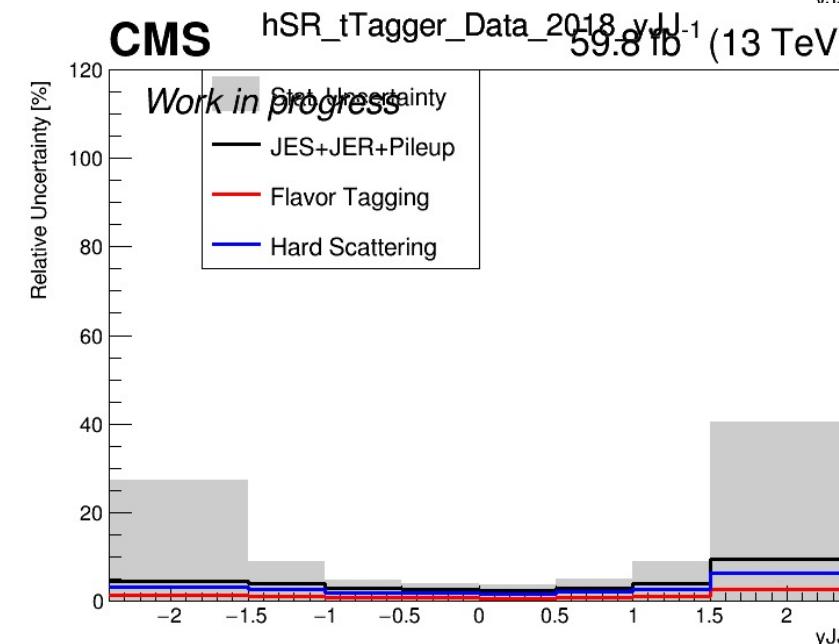
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2017

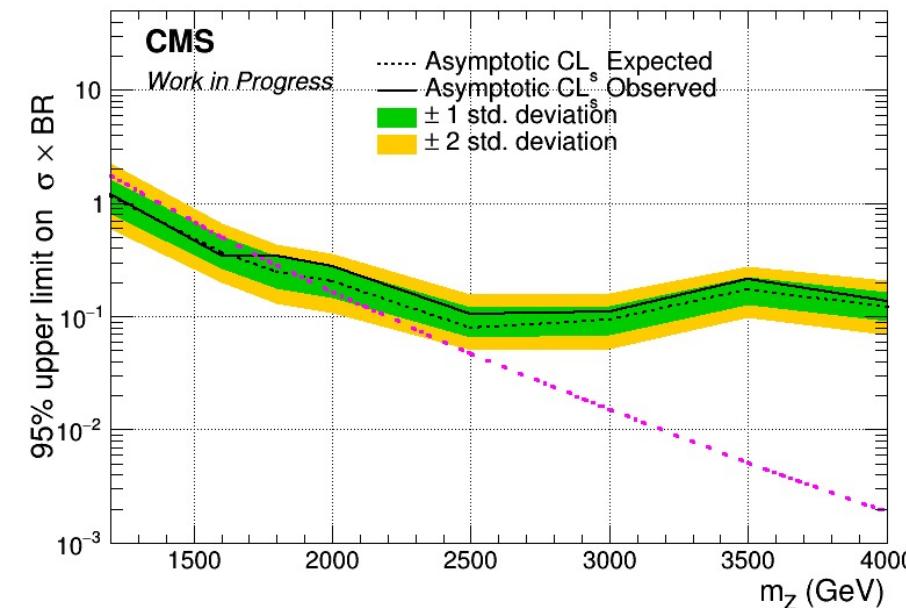


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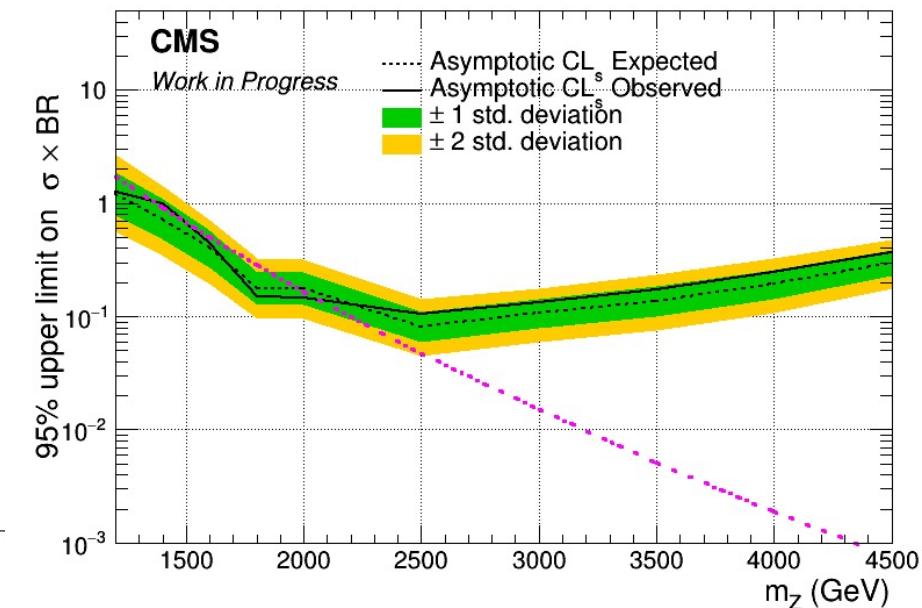


Brazilian Plots (2016_preVFP, 2017 and 2018) with sliding mJJ Cut

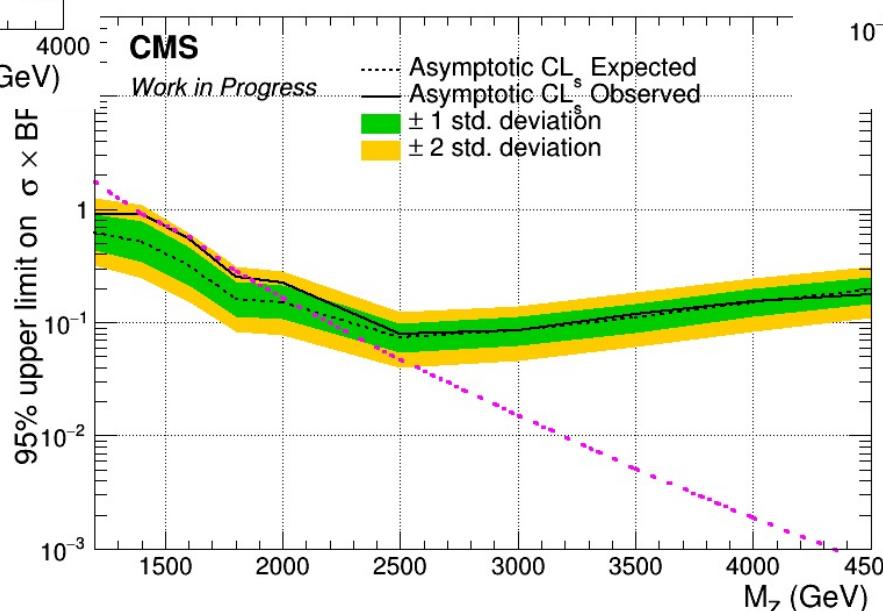
2016_preVFP



2017



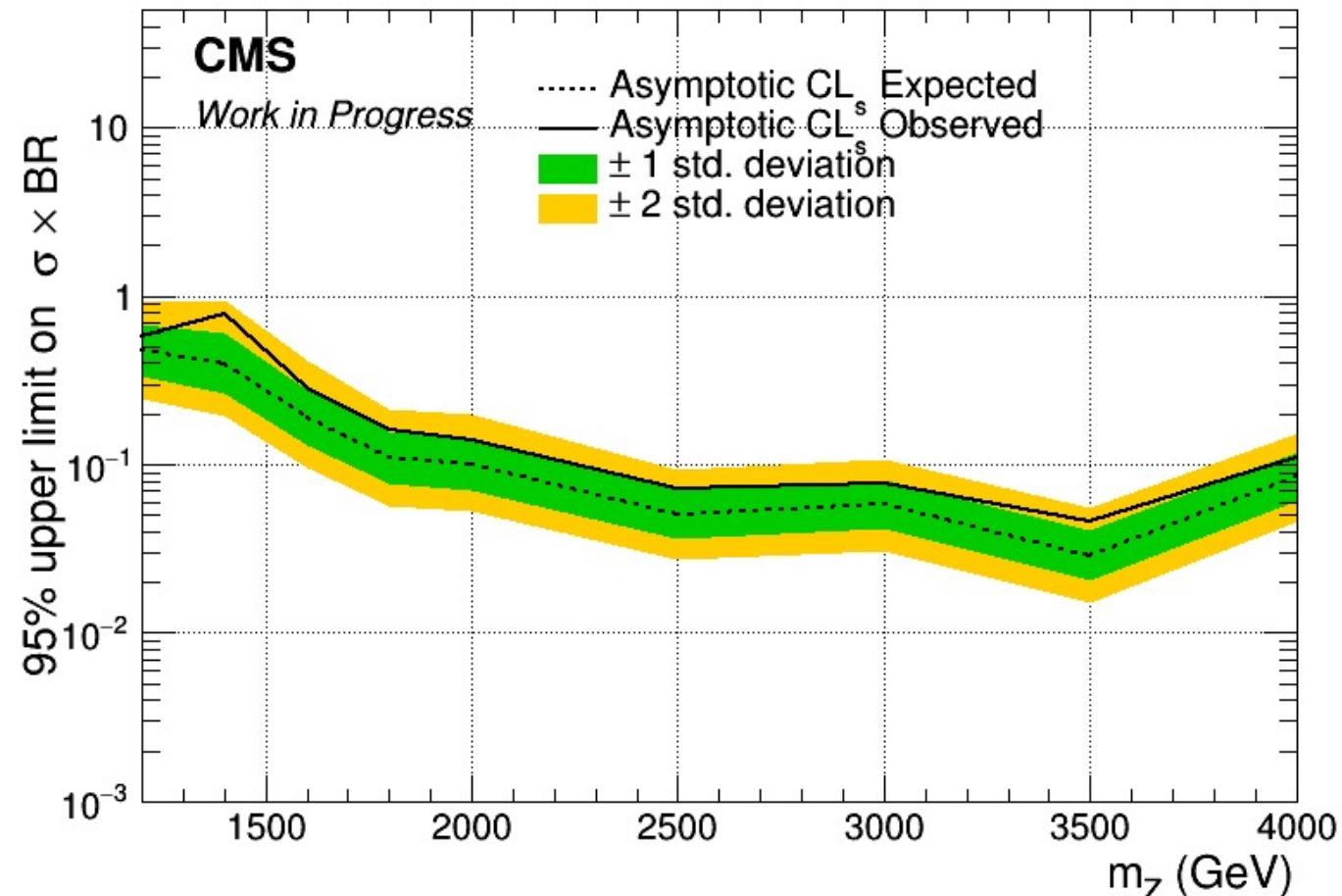
2018



Combined Datacard for 2016_preVFP, 2017 and 2018

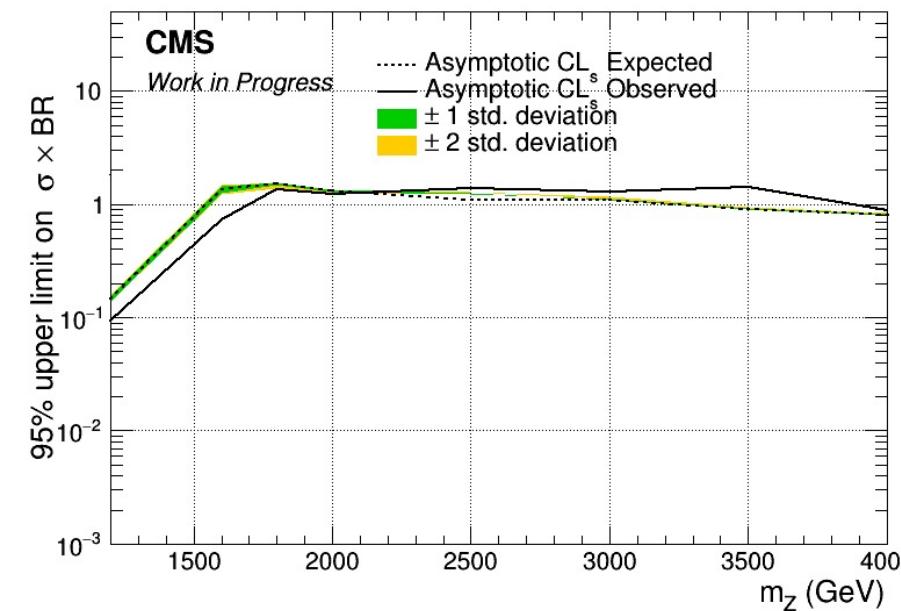
Mass Cut Mapping

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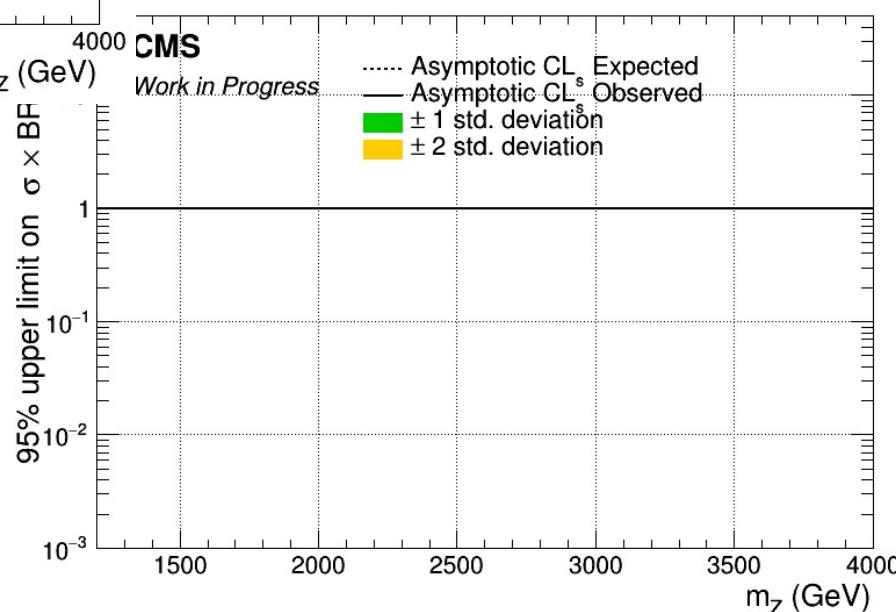


Brazilian Plots (2016_preVFP, 2017 and 2018) with sliding mJJ Cut wrt 2018

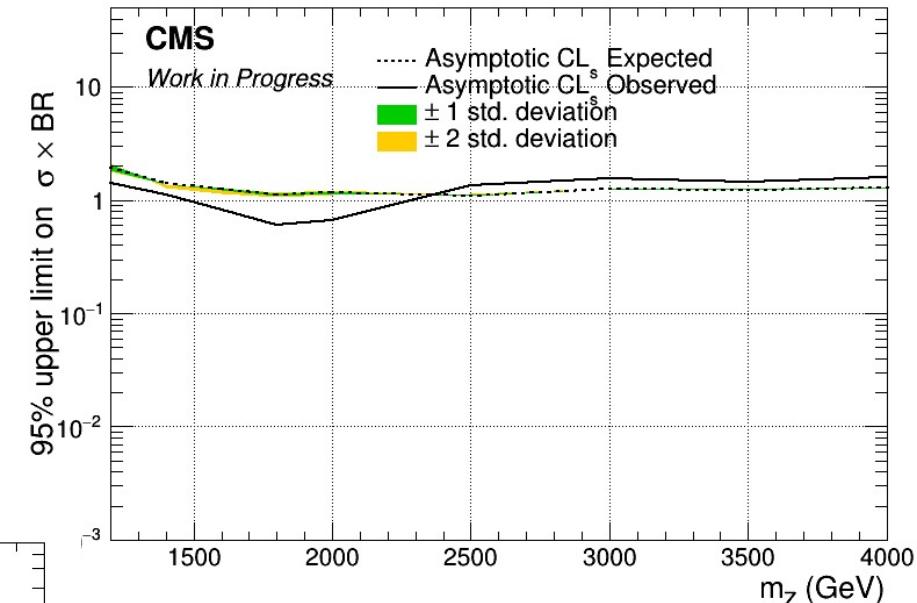
2016_preVFP



2018



2017



Combined Datacard for 2016 preVFP, 2017 and 2018 wrt 2018

Mass Cut Mapping

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