

The figure consists of two panels. The top panel is a log-linear plot of the groomed width distribution, showing the differential event rate $\frac{1}{\#} \frac{dN}{d\lambda} \frac{d\lambda}{dp_T}$ versus the groomed width λ . The y-axis is logarithmic, ranging from 10^{-2} to 10^2 . The x-axis is linear, ranging from 0 to 1. The plot compares CMS data (black squares) with several Pythia 6.428 models: 370 (red triangles), atlas-csc (pink circles), d6t (cyan asterisks), default (orange squares), dw (green downward triangles), and p0 (grey circles). The bottom panel shows the ratio of the groomed width distribution to the CMS distribution, Ratio to CMS , versus the groomed width. The y-axis is linear, ranging from 0.5 to 2. The x-axis is linear, ranging from 0 to 1. The plot includes the same data series as the top panel, with shaded regions indicating the ratio of the models to the CMS data. The top panel is labeled 'CMS, 13 TeV, AK4 jets, Z+jet region, $326 < p_T^{\text{jet}} < 408$ GeV'. The bottom panel is labeled 'Ratio to CMS' and 'groomed width'. The figure is sourced from 'mcplots.cern.ch [arXiv:1306.3436]' and 'Rivet 4.1.0, $\geq 100k$ events'.

(CMS_2021_I1920187)

Rivet 4.1.0, $\geq 100\text{k}$ events

mcplots.cern.ch [arXiv:1306.3436]

2

1

0.5

groomed width