

Dear PC,

Congratulations on these very nice and important results. Please find below the first round of IRC comments to the current paper draft, which we unfortunately found to be in a rather “raw form” and which needs many corrections. The document is organized as follows: first our general comments are listed, these are followed by a detailed list of comments and suggestions to the paper text itself listed in the order of their appearance. The document ends with our suggestions and corrections to the tables and figures which also need to be significantly improved.

We are looking forward to the next draft and the model comparisons.

With kind regards, Domenico, Rachid and Jana.

====> Thanks for all the comments you provided. They essentially improved the quality of the manuscript (see our detailed reply to your comments).

The last two sections are largely reshaped. The detailed discussions on model comparisons are added. Hence, the diff file does not trace the changes in the last two sections.

The only open point is for the studies in event multiplicity classes in p-Pb. In the new version, only the general description of the results is given since we still need time to carefully think about the physics conclusion from the observations. More delicate statements for this part will be added in the version for the next iteration. The conclusion will also be updated accordingly. Of course, your further suggestions are very welcome.

General comments to the content of the paper:

1 Introduction: Perhaps it would be good to take a slightly different approach and do not start the introduction immediately with the motivation being targeted to heavy-ion collisions which looks like that pp and pPb data are serving “only” as a baseline for HI measurements.

====> We modified the introduction and suppress the description of the QCD. Of course there is still the room to improve the text. We will

2 Systematic uncertainties in Table 3 and the respective text for detector material 4% in pp and 0.4% in pPb look different than what we had in the recently submitted paper of which this one is a follow up (it should be in both cases 0.4%, please check).

====> There was a typo, it should be 4% in p-Pb as well

Also evaluation of the syst. uncertainty for competing selection of Lambdas and K0S is missing in this paper and was included in the earlier one.

====> Added

3 The model comparison is a key missing ingredient: depending on the outcome of

the available comparisons the conclusions will need to be better shaped.
====> The discussion for the results are updated. The model comparison, especially for pp, is stated

Specific textual suggestions/corrections of typos

General:

Avoid switching tenses in the paper, you use a mixture of present and past tense.
====> Checked and updated

Abstract

L8: among inclusive, ... -> for inclusive, ...
====> DONE

L10-11: results on multi-strange particles and corresponding ratios...evens -> results on multi-strange particle production and their ratios in jets and in underlying events"
====> DONE

L12: The pT differential -> The transverse momentum (pT) differential
====> DONE

L13: produced by jet is decrease slower than what is reported for inclusive one -> associated with jets decreases slower than the one reported for inclusive particle production
====> DONE

L14 are clear different with the inclusive one in both collision systems -> show a clear difference when compared to the inclusive ones for both collision systems
====> DONE

L16 same behavior with the inclusive one -> same behavior as the inclusive ones
==> DONE

L17 centrality bins -> charged-particle multiplicity bins (this would be certainly more appropriate wording for p-Pb collisions)
====> DONE

L17 the jet one are found to independent on the centrality -> those in jets are found to be independent of collision multiplicity
====> DONE

L17 The results of this paper provide -> The results provide ...
====> DONE

L19: particles production in hadronic collisions at LHC energies -> particle production in hadronic collisions at the LHC energies
====> DONE

Introduction

L21 (A-A) -> (A--A) a medium dash is needed, please correct all over the text
====>DONE

L21-L23 to create a deconfined...hadronic -> to create, under extreme conditions of temperature and density, a deconfined state in which the degrees of freedom are partonic rather than hadronic, the Quark-Gluon Plasma (QGP).
====>DONE

L26 collisions systems -> collision systems
====>DONE

L26 proton-proton(pp) or proton-nucleus(p-A) -> proton-proton (pp) or proton-nucleus (p-A).
====>DONE

L26-L30 please reformulate to avoid starting sentences with "So it is essential ", "So it constitutes ":
In p-Pb collisions, there are not expected hot matter effects. So it is essential -> In p-Pb collisions, where hot-matter effects are not expected, it is essential
In pp collisions, there are not any hot and cold nuclear initial- and final-state effects. So it constitutes a baseline for the nuclear effects -> On the other hand, pp collisions constitutes a baseline for the nuclear effects
====>DONE

L27: initial and final state -> initial- and final-state
====>DONE

L32: medium in thermal...equilibrium -> QGP
====>DONE

L33-L34 These include the long-range angular correlations on the near and away side studies
-> These include the long-range angular correlations on the near and away side of a trigger particle [add ref]
====>DONE

L34 non-vanishing v_2 -> introduce " v_2 "
i.e. non-vanishing 2nd order Fourier coefficients (v_2) ... + Add appropriate ref(s)
====>DONE

L35 have an enhancement ... -> show/manifest an enhancement at intermediate transverse momentum ($p_T \sim 3$ GeV/c)
====>DONE

L36 have a significant enhancement -> show/manifest a significant enhancement
(the verb please adjust such that you do not repeat twice in a row the same one as you have two following sentences with "have an enhancement")
====>DONE

L38 - L43 The jet also constitute an important probe for the study of the QGP in heavy-ion collisions. On the contrary, several measurements show ... To better understand ... It can help ... -> somehow the placement and logical connection of these sentences is strange and reads awkward, please reformulate. Also please note that there is a typo on L38 "The jet also constitute -> The jets also constitute"
====>DONE

L44 The baryon-to-meson ... : this sentence is probably by mistake left alone here without having further supporting sentences ... + a reference would also be needed to support this statement
====> DONE

L45 in jets -> in charged-particle jets
====>DONE

L45 underlying events -> underlying event
====>DONE

L45-L46 in pp ... and p-Pb -> in pp collisions at ... and p-Pb collisions at ...
====>DONE

L46: (Multi-)Strange particles are reconstructed in pseudo-rapidity range -> Strange particles are reconstructed in the pseudo-rapidity range
====>DONE

L47: Jets were reconstructed ... in pseudo-rapidity range -> Jets are reconstructed ... in the pseudo-rapidity range
====>DONE

L48 "R" has not been defined yet, please introduce it
====>DONE

L48 with jet -> with "the" jet
====>DONE

L49: between particle and jets -> between particle momentum and jet axis
====>DONE

L49-51: The results presented in this paper significantly improve the precision, also show the centrality classes dependent and extend to multi-strange particle sector, with respect to our previous measurements -> The results presented in this paper significantly improve the precision compared to ALICE previous measurements [ref missing], including also the centrality dependence and extending to the multi-strange particle sector
====>DONE

improve the precision -> mention on which quantities
====>DONE

L52 the reference is missing

====>DONE

L55 procedure -> methods

====>DONE

L55 charged jet -> charged-particle jet

====>DONE

L56 strategy -> remove strategy

====>DONE

L56: is described -> are described

====>DONE

L56-57: The systematic uncertainties associated with the measurement are also studied in Sec. 3. -> Estimates of the associated systematic uncertainties are also reported in Sec. 3.

====>DONE

L57 “The (multi-)strange hadron with pT differential distributions, particle ratios with pT distributions ...” the sentence reads strange, what about: “The transverse momentum dependence of (multi-)strange hadron distributions and particle ratios, ...”

====>DONE

L59: We suggest to drop “Finally, the paper is briefly summarised in Sec. 5.”

====>DONE

ALICE Detector and data selection

Title of this section: please use consistently (non)capital letters in the titles, in the paper you seem to prefer to not capitalize letters in the titles

====> DONE

L62: relied -> relies (i.e. use present tense, now there is a mix)

====> DONE

L62 systems -> system

====> DONE

L62 VZERO system -> VZERO detector

====> DONE

L62-63 The forward two scintillator arrays -> The two forward scintillator arrays

====> DONE

L64 employed -> were employed,

====> DONE

L64: for both triggering detectors and determining the event multiplicity class -> both

as triggering detector and to determine the event multiplicity class
====> DONE

L67 and locate inside -> and are located inside ...
====> DONE

L69 high-resolution tracking detector -> high spatial resolution silicon detector
====> DONE

L69 The two innermost layers are silicon pixel technology (SPD), covering ... -> The two innermost layers (SPD) are based on silicon pixel technology and cover ...
====> DONE

L71 which called "tracklets" -> which are called "tracklets"
====> DONE

L71 The four outer layers are based on ... -> The four outer ITS layers consist of/are compound of ... (?)
====> DONE

L73 specific energy loss -> specific ionization energy loss
====> DONE

L73-L74 around 10% -> around 10% in the low pT region (up to ~ 1 GeV/c)
====> DONE

L76 sizeable -> large (?)
====> DONE

L76 which filled -> which is filled
====> DONE

L77 The radius and the longitude of TPC -> The radius and the longitudinal dimensions of the TPC are about ...
====> DONE

L79 charged-hadron identification information via ... -> charged-hadron identification via ...
====> DONE

L81: In contrast, at high -> On the other hand, at high
====> DONE

L82 ...energy loss can still be statistically distinguished using ... -> energy loss has to be statistically distinguished via ...
====> DONE

L85 time-of-flight -> time of flight, i.e. without hyphens here ?
====> DONE

L86 - be specific what you mean “almost” full azimuthal acceptance
====>DONE

L89 the value of the resolution in p-Pb collisions is missing here - finish the sentence and check the TOF resolution values
====> The TOF resolution is 90 ps for both pp and p-Pb, the text is updated

L91 is used -> are used (?), although we realize recently more current usage is “data is” but we think strictly speaking data are a plural of datum ...
====> DONE

L92-93 The pp samples were recorded in 2016-2017 with ALICE. The p-Pb sample is collected in 2016: mixture of tenses + it is obvious from the previous that you speak about ALICE. What about to make one sentences out of it, e.g The pp data sample was recorded in 2016-2017, the p-Pb sample in 2016, respectively.
====> DONE

L92 with ALICE -> with the ALICE detector
====> DONE

L93 requiring a hit -> requiring at least one hit
====> DONE

L98 the nominal interaction point (center of the ...) -> the ALICE interaction point
====> DONE

L99 the pp samples consist of -> the pp sample consists of ...
====> DONE

L99 The interaction probability... crossing -> The average number of inelastic interactions per bunch crossing (μ)
====> We did found the exact value of the μ factor for the used data sample. However, the pileup rate in data should low. In the analysis, the IB component is rejected by the displaced vertex cut and the OOB component is separated using correlations between SPD tracklets and V0 amplitude. The sentence is removed to avoid the ambiguity

L101 a verb is missing ... extracted from ... -> was extracted from ...
====> DONE

L101 + L103 unify the way how you quote the integrated luminosity, for pp you have 9.38 ± 0.47 while for pPb you say 287 with a relative uncertainty of 3.7%, probably the first way is better and more compact
====>DONE

L102 About 500 million events of p-Pb samples are selected -> About 500 million events from the p-Pb sample were selected ...
====> DONE

L104 total charged -> total charge

====> DONE

Analysis

L108 Charged jet reconstruction -> Charged-particle jet reconstruction

====> DONE

L109-110 the so called anti-kT algorithm -> the anti-kT algorithm + [add the original reference to the anti-kt jet algo paper, i.e. move it from L112 , Ref. 47]

====> DONE

L110: missing space in “anti-kT algorithm”

====> DONE

L110 commonly known -> commonly used

====> DONE

L110 that starts the clustering-> which starts particle clustering

====> DONE

L111 with the highest -> from the highest

====> DONE

L112 You can remove the sentence “The introduction ...” it is sufficient to have the reference next to the anti-kt algorithm a couple lines above or alternatively reformulate

The introduction of the algorithm can be found -> Details on the algorithm can be found

if you prefer to have the reference mentioned for the first time here

====> DONE

L112-113 Charged particles, which are used as the jet reconstruction inputs -> Charged particles, which are used as input for jet reconstruction ...

====> DONE

L115 When you first time mention the pseudorapidity acceptance for jets here, it would be good to explain why it is “only” <0.35 , i.e. please introduce the fiducial acceptance.

====> DONE

L116 Justify why you selected the cut on jet p_T to be 10 GeV/c

====> DONE

L117-118 Please reformulate this sentence “everything that did not correlate” it sounds a bit colloquial the way it is written

====> DONE

L118 The background density is ... and is not subtracted ...in pp collisions. In p-Pb collisions ... -> The background density determined from the kT algorithm [add a ref] in pp collisions is around ... and is not subtracted. In p-Pb collisions, the underlying

background is larger and the reconstructed jet is therefore further corrected
====>DONE

L112 area -> area of
====> DONE (for L122)

L113 The charged particle are selected -> The charged particles are selected or The charged particle tracks are selected
====> DONE

L115 define η_{jet} of 0.35 clearly as fiducial acceptance otherwise the reader will not understand why the jet acceptance in pseudorapidity is so smaller wrt track acceptance
====>DONE

L116 motivate your selection of 10 GeV/c cut for jets
====>DONE

L118 ... summarizing everything that did not correlate with the hard collisions ... this sentence is too vague
====> DONE

L119 The background density is around ... In p-Pb collisions ... -> propose to reformulate to read The background density (ρ_{bkg}) in pp collisions is around 1 GeV/crad-1 and is not subtracted on jet-by-jet basis. In p-Pb collisions, ρ_{bkg} is larger and the reconstructed jet is
====> DONE

L122 Fastjet ->FastJet
====> DONE

L122 the ghost area 0.005 -> a ghost area of 0.005
====> DONE

L123 for combinatory jet background -> for combinatorial jet background
====> DONE

L123 combinatory jet background density -> misconception: ρ_{bkg} is the pileup transverse momentum density which is used to correct the jet p_T . Combinatorial jets are fake jets produced by the jet finder, they remain in the jet sample especially at low p_T
====>DONE

L123-124 circumvents circumventing the problems arising -> circumvents the problems arising ...
====> DONE

L126-127 Eq. (2) does not have introduced A_{acc} , also it would be good to use common notation of indices as in Eq.(1): $p_{T,i}$ -> $p_{T,\text{jet}, i^{\text{ch}}}$, A_i -> $A_{\text{jet},i}$
====> DONE

L126: by the following approach -> by the following formula
====> DONE

L128 overall kT jet -> over all kT jet ...
====> DONE

L129 ... it does not have conceptual problems like other methods ... -> either explain what do you mean by the conceptual problems or drop this part of this sentence
====> DONE

L130 for the specific use case of p-Pb collisions -> for the specific case of p-Pb collisions
====> DONE

L130-131 It can be shown ... -> is there a reference to be cited here to support this statement. Did you apply the removal of the two largest kT jets in your case? Also, the removal of "the first two kT jets" should be reformulated to be clear that you meant two kT jets with highest pT"
====>DONE

L132 with their specific weak ... -> via their specific ...
====> DONE

L132 add ":" at the end of the sentence (are studied [51]:)
"The following ...", separate the lines with decay channels by comma and in the Omega decay channel put "." at the end as then you already start a new sentence.
====> DONE

L133 Kaon tracks -> kaon tracks
====> DONE

L134 The identification methods for ... -> The identification of
+ insert a space between V0 and (...
====> DONE

L135: into a charged meson (bachelor) -> into a bachelor charged meson (otherwise you have double parentheses)
====> DONE

L136 giving the two-step process -> giving the cascade decay topology
====> DONE

L139 understudy -> under study
====> DONE

L139 matched in either the ITS or TOF detector -> unclear, please elaborate on the matching condition
====>DONE

L140: missing full stop at the end of the sentence
====> DONE

L143 liner function -> linear function
====> DONE

L143 combinatory -> combinatorial
====> DONE

L146: that central region -> the peak region
====> DONE

L146-147: are extracted by fitting the background with a linear function extrapolated under the signal region -> are obtained by subtracting the integral of the background fit function in the peak region from the total bin counting in the same region (or something similar)
====> DONE

L150 the reference is missing
====> DONE

L151 which presented in Eq. 3 -> Reformulate to read "The matching is done on a geometrical basis according to the distance variable defined in Eq. 3"
====> DONE

L152-153: smaller than the matching distance $D (=0.4)$ -> smaller than a pre-defined maximum distance ($D_{\text{max}} = 0.4$)
====> DONE

L154: of the hadron produced via jet fragmentation (write as JE) -> of hadrons produced via jet fragmentation (JE)
====> DONE

L154 but also hadron from Underlying Event -> but also from hadrons from the underlying event (UE).
====> DONE

L155: which is defined -> defined
====> DONE

L156-157: The PC indicates the cone, which is located in η x ϕ space in the perpendicular direction to the jet axis -> The PC indicates the cone in the η - ϕ space located at the perpendicular direction with respect to the jet axis
====> DONE

L157 In addition -> In addition
====> DONE

L158 particle -> the particle
====> DONE

L159: To get the particle from JE -> To estimate the contribution from JE
====> DONE

L160, Eq.(4) separate the lines by comma
====> DONE

L160 normalized -> why do you use the word “normalized”? Isn't it simply a pT-differential particle density?
====> DONE

L160 per-acceptance area -> per-area density?
====> DONE

L161 The definition of the probabilities is not clear, please clarify. What is a “given selection”? These probability values should be quoted in the paper.
====> DONE

L164: of particles are obtained in Monte Carlo -> of each particle is obtained from Monte Carlo
====> DONE

L165 These are estimated using PYTHIA8.2 ... -> For this purpose PYTHIA8.2 and DPMJet in pp and p-Pb collisions are used and the simulated data are propagated through the detector by GEANT3 to simulate ALICE detector response (or something along these lines, feel free to modify)
====> DONE

L166: particle in JC -> particle yield in JC
====> DONE

L166-167: JC particles and the inclusive one -> JC particle yields and the inclusive one
====> DONE

In general, we find the whole sentence “Due to different eta-shape ... “ to read awkward, please try to reformulate and be more precise that you mean by the eta-shape the eta-shape particle distribution and also do not forget to add the missing reference
====> DONE

L171 The detailed of -> The details of, has been -> have been (plural)
====> DONE

L171 ALICE analysis works -> ALICE analyses
====> DONE

L171 usually estimated -> is usually estimated
====> DONE

L173 add the missing reference
====> DONE

L178-179: The total systematic uncertainty, for K0S, L, anti-L, Xi and Omega reconstruction of each data point of the final results, due to the choice of selection criteria are estimated separately in each pT interval -> The total systematic uncertainty for K0S, L, anti-L, Xi and Omega yields have been estimated separately in each pT interval
====> DONE

L181: are knowledge of detector materials -> are related to the knowledge of detector materials
====> DONE

L187 measuring photon conversion -> a reference is missing
====> DONE

L188 systematic due to -> systematic uncertainty due to
====> DONE

L189 with the increased number -> with an increased number
====> DONE

L189 can you specify by how much did you increase the # of TPC clusters? And why only the # of TPC clusters?
====> DONE

What about the systematic error coming from all other track cuts?
====> Here we followed the LF analysis, the other variations are applied on the selection for the decay topology

L191 The number of sigma -> The number of Gaussian sigma ...
====> DONE

L192 have been -> has been
====> DONE

L192 4s to 6s -> from 4s to 6s
====> DONE

L193 lifetime defied -> lifetime is defined
====> DONE

L193 which -> where, of particle -> of the particles
====> DONE

L194 is varied from around -> is varied within
====> DONE

L195 add a comma before "and" ...

and the end of the sentences after Omega add “, respectively.”

====> DONE

L195: and 2ct to 6ct -> maybe express these in cm too, as for the other particles

====> DONE

L196 criteria on -> criteria for

====> DONE

Can you quantitatively say by how many % you varied “around their nominal values”?

====> DONE

The same for L98-L99 -> by how much did you vary the number of sigma?

====> DONE

L201 in jet are originated from -> in the jet originate from

====> DONE

L203: from the chosen thresholds from 0.4 -> from the chosen thresholds of 0.4

====> DONE

L204: From the deviation of different PC cone size ... the relative systematic ... is obtained -> From the deviations obtained for different PC cone size ... the relative systematic ... is estimated

====> DONE

L205 jet pT thresholds uncertainty -> jet pT threshold uncertainty

====> DONE

L206 The systematic of the particle in jets -> The systematic uncertainties of particles in jets

====> DONE

L207 The value are -> The values are

====> DONE

L208 The uncertainty ... -> The uncertainties ...
consider -> include

====> DONE

L210 from the spectra -> from the particle spectra

====> DONE

L211 by how much do you vary the condition in the numerator and denominator?
Say explicitly.

====> DONE

Results and discussion

L214-L215 How this statement is justified? Doesn't seem to be demonstrated in the present paper? If not, a reference would be welcome.

L216 Therefore, all ... -> reformulate to read: Therefore, all the pT-differential densities are reported after summing over particle and anti-particles.

L217 The different selections shown in the following have been -> The different selections shown below have been ...

L217: section 3.3 -> Sec. 3.3 (make it uniform, as done on page 2)

L218 inwhich also introduced the normalization method -> in which also the normalization method has been introduced/was introduced.

L219 density -> densities

L220-221: All the hadrons' densities with pT are observed to become harder -> All hadron densities are observed to become harder with increasing pT ...

L223 the reference to the Table is missing

L225 which generated by jet fragmentation -> which are generated by jet fragmentation

L225 are systematically independent with centrality classes -> do not depend on the charged-particle multiplicity

L228 several selections -> which selections?

L229 pp at -> pp collisions at

L229 p-Pb at -> p-Pb collisions at

L229 particle ratios have an enhancement -> maybe consider to formulate as "particle ratios show/manifest an enhancement" or "particle ratios are enhanced"

L230 the same case of particle ratios -> the same behaviour of particle ratios

L231: lower than the inclusive and UE cases -> lower than those for the inclusive and UE cases

L237 centrality -> multiplicity

L237 dependent -> dependence

L238 however this is barely significant given the quoted uncertainties -> however the measurement is currently dominated by large uncertainties

L239 fairly consistent -> be more specific instead of saying "fairly", btw. I have

L240: missing comparison to models (Fig. 10 to be integrated herein)

Summary

L243: We studied the K0S ... -> The K0S ... have been studied.

L245: The main feature of this analysis is the usage ... , providing insights -> The main aim of the presented analysis, based on ..., is to provide insights ...

L246 charged particle jet -> charged-particle jet

L246 progress -> process

L248: The pT-differential density in events -> For all particles the pT-differential density in events

L248-249: to become harder than -> to be harder than

L249: Also, the dependence -> In addition, the dependence

L251 baron-to -> baryon-to

Conclusion needs to be completed ...

====> Thanks again for reading the manuscript so carefully. The last two sections are large rewritten. The aforementioned comments are not applicable

Tables:

One should maybe consider moving Table 1 and 2 to an appendix, the values quoted in these tables are not discussed in the text and seem to be quoted only for completeness

====> DONE

Table1 and Table 2: the values in parenthesis in Table 2 should be for Omega, this has to be made clear in the caption. Same can be done (i.e. using values in parenthesis) for Lambda in Table 1, instead of repeating the cut variables.

====> DONE

Table 1: caption

topological variable, daughter track and candidate -> topological variables, daughter tracks and V0 candidates

stands for Distance ... -> stands for the Distance ...

====> DONE

Table 2: see comments for Table 1

====> DONE

Table 3: caption

The value are -> The values are

high pT -> and high pT values

Table 3 – Table 10: add a space after “uncertainties”, The value -> The values

====> DONE

The serie of concatenated tables from Table 7 to Table 6 do not read well -> should grouped together in a consistent way

====> DONE

Figures:

As a general comment: all the figures are too small -> consider extending the horizontal size to the page width for instance, more detailed comments below.

====> Most of figs are rearranged

Figure 1: Invariant Mass distribution -> Invariant mass distribution

... in MB p-Pb system -> in MB p-Pb collisions at $\sqrt{s_{NN}}=5.02$ TeV

The grey areas are used for signal extraction -> this should probably read “The grey areas are used for background estimation applied in the signal extraction ...”

... and the interpolate to the “peak” -> and the interpolation to the signal region (we think that you can even drop this part of the sentence in general).

====> DONE

- Missing units in the legend for pT bin ranges, the top legend is touching the upper x-axis

- Right left panel the last entry on the x-axis 1.345 is cut (overlaps probably with the right bottom panel)

- Fonts on both axes should be larger

====> DONE

Figure 2: use consistently in the figures and the caption $R(\text{par}, \text{jet})$

- some fonts are too small to be legible

- Consider using open and closed symbols of the same color for Inclusive vs.

$R(\text{par}, \text{jet}) < 0.4$, the solid squares and solid circles are hard to distinguish, e.g. solid circle - open circle, or solid square - open square combination would look better

reconstruction efficiency for the particle -> strange particle reconstruction efficiency
==> DONE

Figure 4: larger fonts in the legend, axes, units on the y-axis appear to be wrong, should be $\text{GeV}/c \text{ rad}^{-1}$ (?)

==> should be $(\text{GeV}/c \text{ rad})^{-1}$

Caption: in pp -> in pp collisions,

In those plots, the black point -> The black points

with -> which

green point -> green points, and similarly for blue and red points, plural everywhere

particles with from minimum bias events -> particles from minimum bias events,

which from the jet cones -> from jet cones,

particles within perpendicular cone of jet which associated with the underlying ->

particles within a cone perpendicular to the jet, associated with the underlying

Similar corrections needed to the captions of the following Figs. 5-8

Figure 6: in p-Pb -> in p-Pb collisions

Figure 6 the hardening or independence of the distribution as a function of event activity as mentioned in the text L224-L225 could be quantified better by displaying ratios to 0-100%

Figure 6 - Figure 9: all six panel figures are very difficult to read -> please consider displaying the canvas in 2 x 3 instead of 3 x 2, this is also true for Fig 7, 8, 9

Figure 8 baryon(bottom) -> baryon (bottom)

Figures 7 - 8: caption: In those panels, the black point shows the ratio -> The black points correspond to the ratio ... etc also for the other distributions

Figures 7 - 9: caption

A missing space in front of (bottom)

+ And then the same comments apply as for Fig. 4....

Figure 10: remove the legend "PYTHIA 8 BLC mode 0" from all the panels, it is sufficient to have it in the legend with symbols (i.e. the red dashed line)

The bottom right panel is missing information on whether the UE has been subtracted or not (see the other three panels) and also the info on $R(\Omega, \text{jet}) < 0.4$, etc..., Jet anti-kT ... please unify the style ...

Caption: it should read e.g. pT distributions of strange particles associated with charged-particle jets in p-Pb collisions at $\sqrt{s_{\text{NN}}} = 5.02 \text{ TeV}$. Charged-particle jets with $p_{\text{Tjet}} > 10 \text{ GeV}/c$ were reconstructed with the anti-kT algorithm with $R=0.4$. The

data are compared with PYTHIA 8 BCL mode 0 simulations.

==> All comments for figs, if they are applicable, are considered in the rearranged figs