

Status on run-by-run QA at BES-II 19.6 GeV (List of badruns: Ashik vs Li-Ke)

(a) Data sets and QA code

(i) Both of us used same input picodst files from the local storage (Run region: 20056032-20093036 (1143 runs, including 248 injection runs))

(ii) We ran same QA code on RCF (all jobs were not completed even after repeated re-submissions - almost 16.7% data files were missed for both of us)

(iii) Used same automated QA algorithm to find badruns

(iv) QA variables: <refmult>, <eta>, <phi>, <de/dx>, <sDCAxy>, and sDCAxyRMS

(b) Information on Runs

(i) Total no. of runs (without injection runs): 895

(ii) RCF analyzed: 887 runs

(iii) Both of us missed same 8 runs (**No servers are available to read the file.(error code: 3011)**):

20056032, 20057032, 20057037, 20063004, 20063042, 20064022, 20075012,
20088004

- These runs have a very few events (~100 events)

Badrun lists

(i) 86 consistent badruns (We both found):

20057007 20057026 20057050 20060023 20060025 20062010 20062011
20062036 20063011 20063034 20063039 20064040 20065010 20066012
20067022 20072034 20075014 20075015 20076040 20076058 20076059
20077018 20081002 20081014 20081015 20082060 20083024 20086012
20087007 20091012 20064009 20069032 20072035 20072036 20087006
20089008 20090024 20091011 20092054 20063013 20065018 20072039
20090011 20064011 20064012 20072041 20072045 20072047 20059001
20057025 20058000 20058001 20058002 20060012 20060060 20067014
20067015 20067023 20067029 20067030 20068029 20070041 20070042
20070043 20070044 20071001 20071004 20074027 20077017 20083009
20093018 20060021 20060061 20062012 20063035 20064008 20067024
20067045 20067046 20071000 20071005 20071006 20071037 20082065
20060022 20060062

Badrun lists

(ii) Extra 6 badruns (Ashik):

20063048 20064002 20065063 20088006 20060001 20072048

(iii) Extra 12 badruns (Li-Ke):

20058004 20060026 20063002 20069030 20092011 20058005 20061024 20069054
20070047 20071027 20058003 20071036

NOTE: The discrepancy is being notified and discussed with the developers of the QA algorithm. Possible reasons in the above discrepancies (few extra badruns) are the following:

- (a) Even if we read the same runs, for a very few runs, the no. of events read might be different due to uncertain rcf behaviour.
- (b) The mean and sigma of the QA variable is dependent on no. of events read. The badrun finding algorithm is sensitive to this mean and sigma. This could be the possible reasons for this little discrepancies. Any other thoughts on this are welcome!

Thank You