

# *Brunel Online & Monitoring*

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# Online Reconstruction

- package "OnlineBrunel" depends both on Online & Brunel
- for FEST: Brunel v35r0p1, Online v4r22
- too much logging output: info, warnings, errors
- Monitoring sequence switched on
- histograms produced online

## Issues:

- Adder only sees histograms booked at initialization
- Saver *idem dito* & wrong directory structure in root file



Communication flow:

- Brunel publishes booked histograms to DIM
- Adder retrieves histogram list from DIM
- Saver, gets list from DIM, then stores histos in saveset every n minutes
- Presenter expects savesets in particular place
- Presenter expects histograms in particular place in saveset

See O.C. talk for more information



# Organizational issues

- histograms are only useful when looked at!!!!
- Many histograms produced...
- but:
  - which ones contain sensible information...?
  - which ones are useless?
  - how to interpret what is plotted?
    - use (predefined) reference histograms...
    - Think hard: shift crew should see immediately that something went wrong!
- from each sub-detector a 'volunteer' for monitoring...
- Apart from RICH: little interest in FEST/monitoring
- Note: same histograms also available from ES processing & T0/1 reconstruction



## BruneOnline:

- want to see only ERRORS which render reconstruction useless
- start studying speed-up of Brunel (by setting options)
- use online monitoring tools to find differences...(!)

## Monitoring:

- proof of principle
- but not yet ready for standard running (Adder/Saver)
- too many histograms to inspect all: select 4 per subdetector
- need to program HistoDB with those four histos/subdetector
- define online 'pages' with relevant histos
- define reference histograms
- automated analyses using OMAlib...

