DAQ WG

Conveners: Chris Cuevas, Alexandre Camsonne, Jeff Landgraf, Jo Schambach

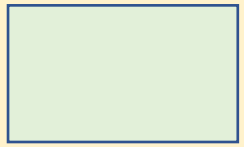
DAQ Speakers for Collaboration meeting: 3 x (15+5) minutes

- Markus Diefenthaler: Streaming Workshop and vision for the streaming DAQ
- Jeff Landgraf: Overview of EPIC DAQ and activity updates
- Fernando Barbosa: Update on eRD109 ASIC efforts

Recent Progress and Activities

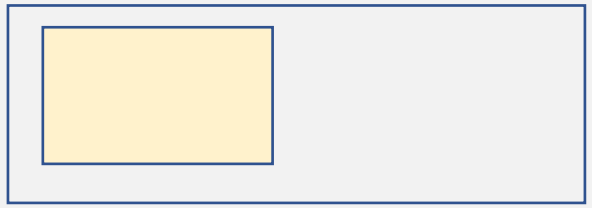
- Naming Scheme for components and much more firm descriptions (sensor, adapter, FEB, RDO, DAM, GTU)
- RDO efforts
  - Dec 9th Special Streaming Workshop on RDO interfaces at CFNS
  - Forming small RDO design group oriented on resolving timing issues
  - Starting effort to specify detector readout chains, RDO locations, and identify detector specific RDO needs
- eRD109 ASIC efforts continuing

EPIC Electronics / DAQ



Global Timing Unit (GTU)

-Interface between collider, Run Control, & DAM
-Config & Control
-Clock & Timing



Name	Sensor	Adapter	Front End Board (FEB)	Readout Board (RDO)	Data Aggregation Module (DAM)	Computing
Sharing	Detector Specific	Detector Specific	Detector Specific	Few Variants	Common	Common
Function	-Multi-Channel Sensor	-HV/Bias distribution -HV divider -Interconnect routing	-Amplification -Shaping -Digitization -Zero Suppression	-Communication -Aggregation -Formatting -Data Readout -Config & Control -Clock &Timing	-Computing Interface -Aggregation -Software Trigger -Clock & Timing -Config & Control	-Data buffering and sinking -Run Control -Calibration Support -QA / Scalers -Collider Feedback -Event ID/Building? -Software Trigger -Monitoring
Attributes	-MAPS -AC-LGAD -MCP-PMT -SiPM -LAPPD	-Sensor Specific -Passive	-ASIC/ADC -Discrete -Serial Link	-FPGA -Fiber Link	-Large FPGA -PCIe -Potentially Ethernet	