E614 Collaboration Meeting
Data Acquisition system

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Test Chamber Run - DAS

- HARDWARE: basics components
  - BiRa Fastbus crate (CEBAF version)
  - SFI - Struck Fastbus Interface
  - MVME 162 CPU, standard Ethernet, name: DMASTER
  - 2 1877 Fastbus TDC's (500 ps/bin ; 32 ms maximum range)
  - CES 8210 Camac Branch Driver
  - 2 Lecroy scalers (no inputs were connected)
  - 1 2232A Scanning ADC
- Host computers:
  - RMCD06 - Decstation 5000/240 with 24 MB
  - 2 GB disk for data storage
  - 8510 Exabyte drive for data logging
  - RALPH1 - Alpha

Test Chamber Run - DAS

- Software
  - DMASTER runs under VxWorks 5.2
  - RMCD06 runs under Ultrix 4.4
  - RALPH1 runs under OSF/1 v3.2
  - MIDAS is the software DAQ/data base system
  - MOFIA is the online/offline analysis shell

What have we learned

- Problems
  - Noise from Fastbus Crate PS - radiates
  - Noise when TDC's are being readout - transmitted over the cables
  - Readout time - too long when using library routines.
  - Network buffer transmission prevents data taking
  - CPU of host/logging computer must be more powerful