

## Presentation to Controls Working Group

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Perspective of :

- relatively new person to Accelerator Division (training issues, understanding the paradigm)
- interested in validating instrumentation (data acquisition issues)
- interested in developing/supporting exploitation of data (data acquisition and availability issues, data presentation issues)
- seen from Control room as user, seen from Labview front-ends as developer of instrumentation.

Do not expect all issues to be direct responsibility of Controls dept.

- need infrastructure support whatever happens...

## Department applications

- used largely to diagnose instrumentation;  
I37,38,40; T37,38 40; D40 – BLM and BPM test and setup  
I45,46; T45,46 – BLT and Flying Wire setup and data plot  
R33, R57 – BPM diagnostics and monitoring  
S53 and W70 – QXR (slow extraction)

Total ~15 – all expected to live if not expand.

## New applications

- front-ends do most of the processing and analysis and provide data to machine group applications.
- expect new setup applications for new/upgraded stuff (Synclight, OTR's and IPMs – front-ends setting ACNET variables )

## Quality assurance and maintenance

- use current system for applications

Core services (user perspective – Duane and Eugene other perspectives)  
openness of system

- FTP, D43, D44, BH (Web version of D44, great idea but less reliable)

*openness of system is a valuable asset;*

*allows for 24/7 progress compared to the 8/5 of a tightly controlled one.*

What is missing (my perspective, again)

*people have made an enormously impressive system*

- training sessions for new people (OACs, console pages...  
documentation exists but one needs an introduction)
- coherent way to store large amounts of data generated by instruments  
(raw flying wire data, raw SBD data, raw Synclight data)  
(probably Instrumentation Department's responsibility but need Controls  
support and wisdom – challenge of a data acquisition vs control system)
- FTP for array devices
- interactive display setting (exists for waveform display)
- system to organize foreign executables on consoles (not for control but  
for display and this may increase load on network)
- slots in MDAT (general issue of rapid distribution of beam and machine  
parameters)