DCS Status Report

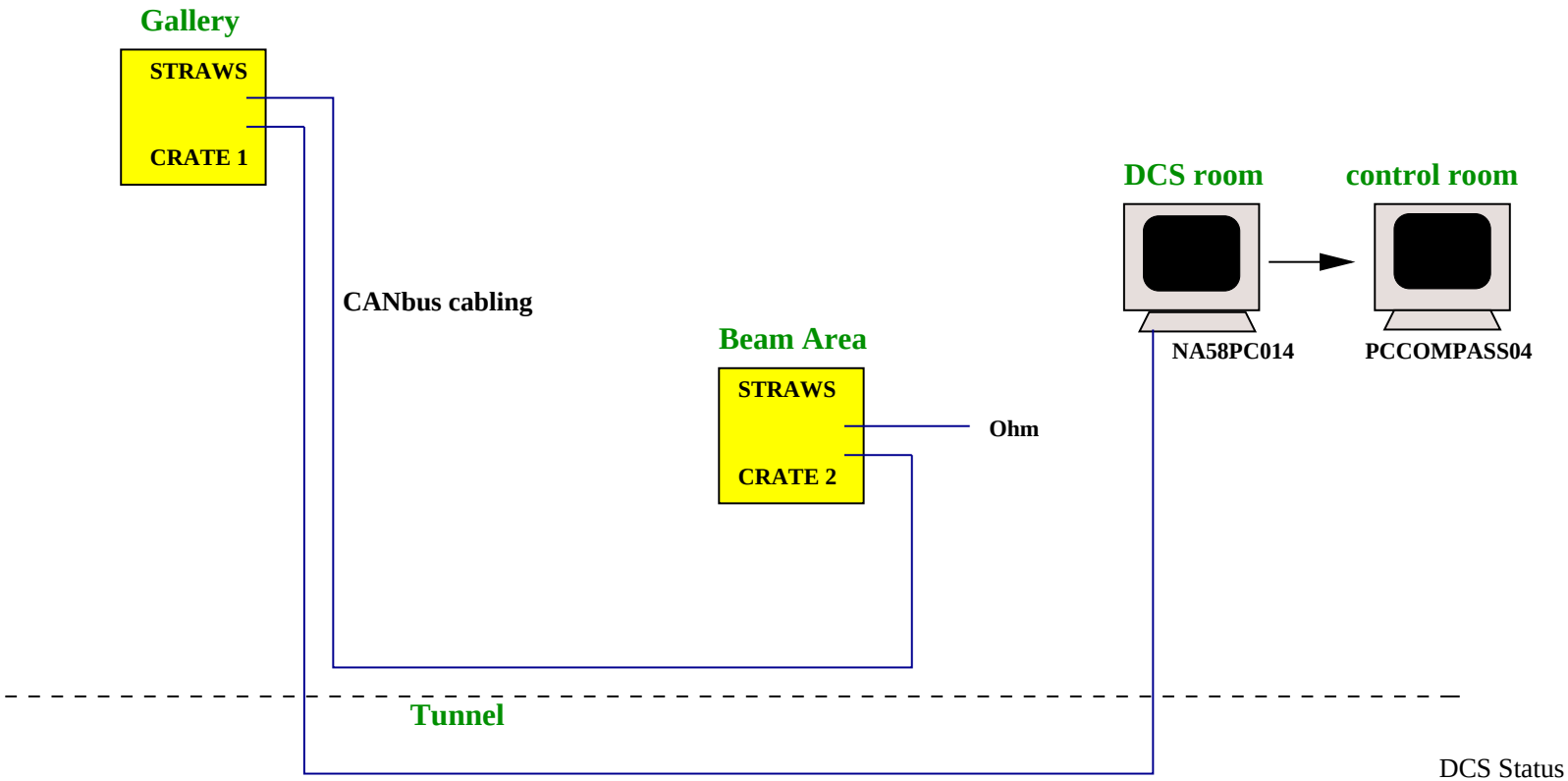
C. Quintans, 11 December 2003

Outline

- ISEG HV System for Straws
- Temperature and humidity control for Straws
- Trigger Lecroy HV control
- Trigger NIM crates control
- Overview of requests received
- Other DCS tasks

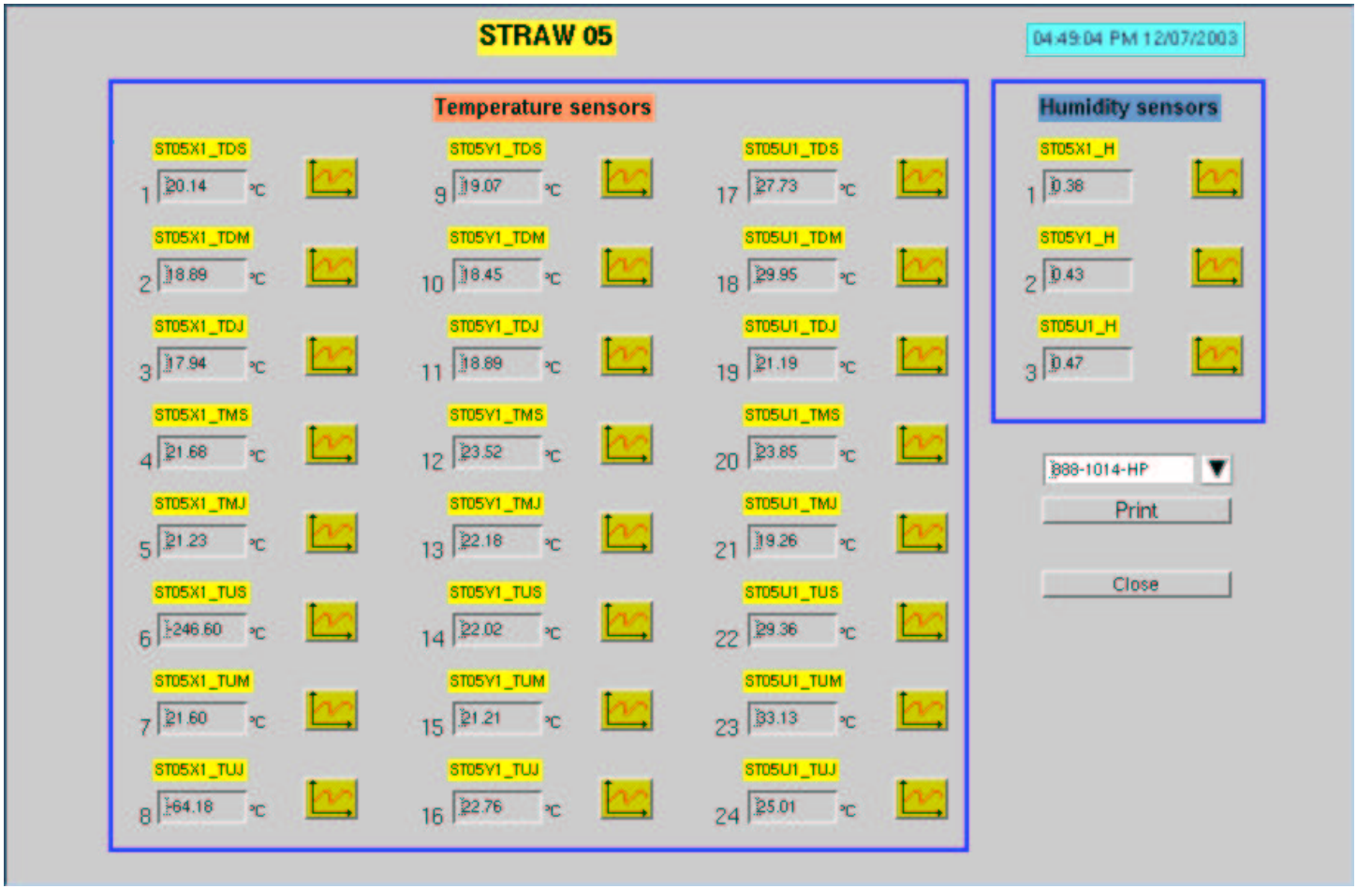
ISEG HV System for Straws

- The integration of ISEG HV for Straws in the DCS is done using a modified SLiC (by David Sora).
- This SLiC will be compiled as an OPC server (contrary to the existing SLiCs for CAEN, that use a DIM server to communicate with PVSS)
- The SLiC OPC server will run in the DCS Windows PC (na58pc014), that sends the data to the DCS main linux PC (pccompass04).



Temperature and humidity control for Straws

- 2 ELMBs are installed (fixed to the supporting structure of ST05 and ST06) and integrated in PVSS (by Maria Varanda).
- These receive info from 24 temperature sensors and 3 humidity sensors each, and send it to the DCS Windows PC.



Trigger Lecroy HV control

- Communication with Lecroy HV modules is done via serial port. It uses a driver (SLiC like), compiled as a DIM server, and running in **pctri07** to send data to PVSS in the main linux **pccompass04** PC (by Igor Manouilov).
- Control of 1 crate containning 256 HV channels, including voltage setting and On/Off possibility for individual channels. On/Off for the entire crate also possible.
- No survey time defined: the cycle is completed when info from last channel is sent/received (speed is $\approx$ 10 channels/s). Change in channel settings is immediate.

Trigger NIM crates control

- 12 NIM crates will be monitored using 2 ELMBs for: $\pm 6V$, $\pm 12V$, $\pm 24V$, On/Off and Status.
- Specifications for the rear Centronix connectors were obtained.
- Prototype cable is built accordingly and ready for production.
- Implementation in PVSS will follow.

Overview of requests received

- Integration of alerts from MicroMegas and DC (Channel Access)
- Monitoring of Gas System for MW1, MW2 and RICH Wall (PLC3)
- Monitoring of RICH Wall LV (ELMB) and HV (?)
- Integration of RICH LV System (Wiener OPC server)
- Monitoring of Gas System for Silicon detector (ELMB)
- Integration of 3 Straws LV crates (Wiener OPC server)
- Control of Target magnets (LabView - OPC server)
- Monitoring of cold Silicon temperatures (ELMB)
- Additional temperature sensors for Micromegas and DC (ELMB)

Other DCS tasks

- Replace SLiC by OPC server for all Wiener fan-trays
- Pass info to/from SLiC by group instead of by channel
- Upgrade of some OS on PCs and test of new drivers
- Revision of part of the hardware
- Documentation