

**Minutes of the EMCAL Online Meeting  
held on 23 October 86 at ORSAY**

Present:

Clermont-Ferrand:

M.Brossard, R.Chadelas, D.Pallin,

Ecole Polytechnique:

G.Bonneaud, J.Bourotte, L.Marckmann, P.Matricon, H.Videau,  
I.Videau,

Glasgow:

R.Edgecock, C.Raine,

Marseille:

A.Bouissent, F.Etienne, P.Payre,

Neils Bohr Inst.:

H.Bertelsen, J.R.Hansen, J.D.Hansen, A.Lindahl, G.Petersen,

Orsay:

G.Barrand, O.Callot, R.L.Chase, A.Cordier, A.Ducorps,  
J.F.Grivaz, A.M.Lutz, G.Rahal, G.Raso, J.J.Veillet,

RAL:

D.R.Botterill, R.Cliff, M.Edwards, J.Harvey, M.Morrissey,  
P.R.Norton, J.C.Thompson,

Saclay:

D.Lloyd-Owen, A.Joudon, S.Loucatos, J.Pascual, J.Rander,  
J.F.Renardy, J.P.Schuller,

Transparencies have already been distributed.

**ONLINE SYSTEM IN THE TEST BEAM AUG-OCT 86 - I.VIDEAU**

Slow control of the gas system was not ready at the beginning and was only usable by the experts (on purpose) . It should be integrated in the standard UPI interface. High voltage tripped in automatic mode, so it was run in manual mode. The user interface should be changed to UPI.

DAQ performed well except that it crashed too much. The major remaining problem (the size of the paging file) has been fixed since the run.

There was a plea for users to be able to choose between old versions of modules (with known and avoidable bugs) or new versions (usually with mysterious bugs).

Electronic calibration was done by the experts in stand-alone mode. It has to evolve to run on the ROC+VAX.

#### **GAS AND HIGH VOLTAGE MANIPULATION AND SURVEY - P.PAYRE**

The software needs to be extended to cope with partial restarts. There is a need for level 2C of GKS. Data was recorded for 90% on the time and losses were due equally to disk quota problems and startup problems.

#### **THE DAQ SYSTEM - J.BOUROTTE**

Jean reviewed the functionality and reliability of each component of the DAQ system. One remaining problem was that RUN does not cope with faults in other processes. Future work will include writing processes so that they can be restarted manually after a crash and integrated in the run, and removing all ECAL specific code to make everything site independent.

#### **FASTBUS - O.CALLOT**

Olivier described the Fastbus readout, which worked well once the problems were circumvented. The problems included block transfers between the FAS and the ADC or SEQ, data dependent losses in loading SEQ programs and that the SEQ is unable to run at full Fastbus speed in all circumstances.

#### **ELECTRONICS CALIBRATION - J.J.VAILLET**

Jean-Jacques explained what electronic calibration is possible in ECAL and the reasons for doing it. It should be noted that in future the pedestal mean and width will not be a good indication of channel operation. He proposed that a quick check of channel functionality should be done each fill and a high statistics calibration done each day.

#### **DISCUSSION ON THE ONLINE SYSTEM**

Points made included:

The system was fragile because we were the first user.

Would like to keep electronic environment on VXALBM to continue testing but ADC+ FB crate needed at Orsay.

System is being installed on the TPC VAX and may be installed on a Paris VAX.

Request for histograms matching the petal pad structure for next year.

Request for integration of slow control into system i.e. scheduler to run slow control tasks and presenter and status display to show slow control information .

#### **FUTURE ACTIVITIES FOR THE ALEPH DAQ GROUP - J.HARVEY**

This was a presentation of the program of a special DAQ meeting to be held during the next plenary week.