

Long Term Data Preservation in ALEPH

Marcello Maggi
INFN-Bari

The ingredients

- Bit Preservation and Integrity
- Data Access including Metadata
- New Data Production (excluding new Metadata)

- Installation - Environment - Validation
(Almost) lost
- Automatic Job Submission
- Data Discovery

Bit Integrity Checks

Found 200 Mbyte lost during a porting from one medium to another (unused format, so not bad...)

Due to wrong tape assignment it got rewritten

User Tool for Integrity Check should be devised

On Data Access: From Local

My Mac

The screenshot displays the ALEPH data analysis software interface on a Mac. The main window shows a 3D detector model with particle tracks. A status bar at the top displays parameters like ECM=130, Pch=85.7, Ef1=124, Evi=57.1, Eha=35.1, dali1, Run=40334, Evt=1164, and Detb= E1FFFF. A terminal window on the right shows command-line instructions for event navigation and display.

Terminal Window (DALIhelp):

```
Last processor FI - GE
Top Level up - GT
Read/Search Event
***** page EV\0 *****
3-may-1999

Read next event. - RN
READ NEXT EVENT and DISPLAY it. - DN

Set event number = x = NU
Set run number = x = RU
Read selected event. - RE
READ SELECTED EVENT and DISPLAY it. - DE

Rewind file - RW
Rewind file and redraw all - RW

Change input file - FI

If EDIR:
Read event backward. - RE
Read event backward and display it. - DE
Read last event on EDIR - RL
Read last event and display it. - DL
Read first event = rewind - RF
Read first event and display it. - DF

List EDIR selection classes -> ->
No class is selected. - SC
Class x is selected. = SC
(e.g.: SC=3,12,20:
The classes 3,12,20 are selected)
Add class x to class list = AC
(e.g.: AC=5,19; The classes 5,19
are added to the class list)
set selected classes to zero - ZC

If more than one class is selected:
set SA if all classes are valid - SA
set SO if at least one class is valid - SO

Set AND - SA
Set OR - SO

List EDIR file -> ->
List run/event # of 6 last events - LL
Read data Base, initialize geometry with current run number. - SB

DRAW whole window AGAIN - DD

FOR BEGINNERS: How to continue -> ->
Explanation of header line -> ->
List, enable, disable BOS-banks-> ->
Clear window for next event -> ->
Copy events to ALWS with ALPHA -> ->
```

To Global

voms admin for VO: vo.aleph.cern.ch Current user: CN=maggim,CN=411516,CN=Marcello Maggi

[Home](#) [Browse VO](#) [Configuration Info](#) [Other VOs on this server](#)

Configuration information:

VOMS-Admin URL for this vo:

```
https://voms-admin.cern.ch:8443/voms/vo.aleph.cern.ch
```

VOMSES string for this vo:


```
"vo.aleph.cern.ch" "voms.cern.ch" "15013" "/DC=ch/DC=cern/OU=computers/CN=voms.cern.ch" "vo.aleph.cern.ch"
```

Example Mkgridmap configuration for this vo:

```
group vomss://voms-admin.cern.ch:8443/voms/vo.aleph.cern.ch .vo.aleph.cern.ch
```

Using New Infrastructures

Site for the ALEPH Virtual Organization

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This Site: Site for the ALEPH



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Welcome to ALEPH Virtual Organization site!

The official ALEPH site is [here](#)

This page is intentend to describe the use of the GRID for the ALEPH experiment at CERN. ALEPH has now a Virtual Organization called vo.aleph supported by EGI-InSPIRE SA3 as part of TSA3.3 Services for HEP

EGI

GRID is used to allow data transfer from CERN to external sites.

New Approaches

Standards in data formats allows longer term data access

New Data Production, because of new models, and so new Simulation requires still experiment full chain

sw



Virtualization



Creation of an ALEPH VDI file

Conclusions

- ALEPH Data are available and usable
- Real question is how to make access through today and future e-infrastructures
- Number of users capable to run ALEPH analysis decreases in time... (getting old)

Define and Adopt standards for truly Open Access to the data?