

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

AGATA DAQ Status

Xavier Grave

Institut de Physique Nucléaire d'Orsay

10th July 2008

Xavier Grave

[NARVAL News](#)[Legnaro Installation Report](#)[DAQ hardware organisation](#)[Global scheme](#)[Some photos](#)[DAQ software organisation](#)[DAQ Control](#)[Demonstration](#)[Todo list](#)[Presentation
Overview](#)[NARVAL News](#)[Legnaro Installation
Report](#)[DAQ hardware
organisation](#)[Global scheme](#)[Some photos](#)[DAQ software
organisation](#)[DAQ Control](#)[Demonstration](#)[Todo list](#)

Xavier Grave

Presentation

Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation

Global scheme

Some photos

DAQ software
organisation

DAQ Control

Demonstration

Todo list

► In actors :

Xavier Grave

Presentation

Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation

Global scheme

Some photos

DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ In actors :
 - ▶ Grab some data flow buffer : watcher system embedded in all actors

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ In actors :
 - ▶ Grab some data flow buffer : watcher system embedded in all actors
 - ▶ File Browsing

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ In actors :
 - ▶ Grab some data flow buffer : watcher system embedded in all actors
 - ▶ File Browsing
- ▶ In actor coordination :

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ In actors :
 - ▶ Grab some data flow buffer : watcher system embedded in all actors
 - ▶ File Browsing
- ▶ In actor coordination :
 - ▶ Configuration files list

Xavier Grave

[Presentation](#)
[Overview](#)

[NARVAL News](#)

[Legnaro Installation](#)
[Report](#)

[DAQ hardware](#)
[organisation](#)
[Global scheme](#)
[Some photos](#)
[DAQ software](#)
[organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

- ▶ In actors :
 - ▶ Grab some data flow buffer : watcher system embedded in all actors
 - ▶ File Browsing
- ▶ In actor coordination :
 - ▶ Configuration files list
- ▶ Topology files handling available as JAVA library

Xavier Grave

- ▶ 1 Host gateway

Presentation
Overview

NARVAL News

Legnaro Installation
Report

**DAQ hardware
organisation**
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

Xavier Grave

Presentation

Overview

NARVAL News

Legnaro Installation
Report

**DAQ hardware
organisation**

Global scheme

Some photos

DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ 1 Host gateway
- ▶ 11 1U IBM Pizza boxes servers

Xavier Grave

- ▶ 1 Host gateway
- ▶ 11 1U IBM Pizza boxes servers
- ▶ 1 KVM

Presentation
Overview

NARVAL News

Legnaro Installation
Report

**DAQ hardware
organisation**
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

Xavier Grave

- ▶ 1 Host gateway
- ▶ 11 1U IBM Pizza boxes servers
- ▶ 1 KVM
- ▶ 2 Switches
 - ▶ DAQ Services
 - ▶ DAQ Data flow

Presentation
Overview

NARVAL News

Legnaro Installation
Report

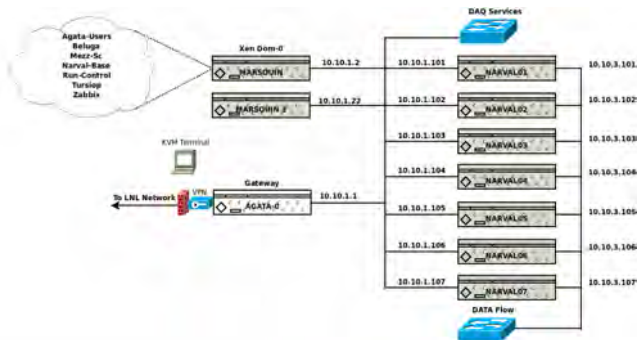
**DAQ hardware
organisation**
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

Xavier Grave



[Presentation Overview](#)

[NARVAL News](#)

[Legnaro Installation Report](#)

[DAQ hardware organisation](#)

Global scheme
[Some photos](#)
[DAQ software organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

Inside the Legnaro computer room

AGATA DAQ Status

Xavier Grave



[Presentation Overview](#)

[NARVAL News](#)

[Legnaro Installation Report](#)

[DAQ hardware organisation](#)

[Global scheme](#)

[Some photos](#)

[DAQ software organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

Inside the Legnaro computer room

AGATA DAQ Status

Xavier Grave



[Presentation Overview](#)

[NARVAL News](#)

[Legnaro Installation Report](#)

[DAQ hardware organisation](#)

[Global scheme](#)

[Some photos](#)

[DAQ software organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

Inside the 1 U Pizza BOX

AGATA DAQ Status

Xavier Grave



[Presentation Overview](#)

[NARVAL News](#)

[Legnaro Installation Report](#)

[DAQ hardware organisation](#)

[Global scheme](#)

Some photos

[DAQ software organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

Also needed for DAQ in order it runs quietly

AGATA DAQ Status

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list



Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation

Global scheme

Some photos

**DAQ software
organisation**

DAQ Control

Demonstration

Todo list

▶ General servers

Xavier Grave

[Presentation](#)
[Overview](#)

[NARVAL News](#)

[Legnaro Installation](#)
[Report](#)

[DAQ hardware](#)
[organisation](#)
[Global scheme](#)
[Some photos](#)
[DAQ software](#)
[organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

▶ General servers

- ▶ agata-0 : DAQ gateway and openvpn server
- ▶ marsouin, Xen Host
 - ▶ agata-users : for PSA, tracking developers
 - ▶ beluga : general server for automatic installation
 - ▶ mezz-sc : slow control server for handling mezzanines using ENX
 - ▶ narval-base : running basic NARVAL services
 - ▶ run-control : running run control system
 - ▶ tursiop : host mediawiki for documentation
 - ▶ zabbix : host nodes surveyor

Xavier Grave

[Presentation](#)
[Overview](#)

[NARVAL News](#)

[Legnaro Installation](#)
[Report](#)

[DAQ hardware](#)
[organisation](#)
[Global scheme](#)
[Some photos](#)
[DAQ software](#)
[organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

▶ General servers

- ▶ agata-0 : DAQ gateway and openvpn server
- ▶ marsouin, Xen Host
 - ▶ agata-users : for PSA, tracking developers
 - ▶ beluga : general server for automatic installation
 - ▶ mezz-sc : slow control server for handling mezzanines using ENX
 - ▶ narval-base : running basic NARVAL services
 - ▶ run-control : running run control system
 - ▶ tursiop : host mediawiki for documentation
 - ▶ zabbix : host nodes surveyor
- ▶ marsouin2, marsouin duplication

Xavier Grave

[Presentation](#)
[Overview](#)

[NARVAL News](#)

[Legnaro Installation](#)
[Report](#)

[DAQ hardware](#)
[organisation](#)
[Global scheme](#)
[Some photos](#)
[DAQ software](#)
[organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

- ▶ General servers
 - ▶ agata-0 : DAQ gateway and openvpn server
 - ▶ marsouin, Xen Host
 - ▶ agata-users : for PSA, tracking developers
 - ▶ beluga : general server for automatic installation
 - ▶ mezz-sc : slow control server for handling mezzanines using ENX
 - ▶ narval-base : running basic NARVAL services
 - ▶ run-control : running run control system
 - ▶ tursiop : host mediawiki for documentation
 - ▶ zabbix : host nodes surveyor
 - ▶ marsouin2, marsouin duplication
- ▶ narval01 -> narval07 : Data flow nodes

Xavier Grave

Presentation

Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation

Global scheme

Some photos

DAQ software
organisation

DAQ Control

Demonstration

Todo list

Pietro Molini Presentation

Xavier Grave

[Presentation](#)[Overview](#)[NARVAL News](#)[Legnaro Installation
Report](#)[DAQ hardware
organisation](#)[Global scheme](#)[Some photos](#)[DAQ software
organisation](#)[DAQ Control](#)[Demonstration](#)[Todo list](#)

Jerzy Grebosz Presentation

Xavier Grave

Presentation

Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation

Global scheme

Some photos

DAQ software
organisation

DAQ Control

Demonstration

Todo list

Daniele Mengoni Presentation

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

► General services

Xavier Grave

- ▶ General services
 - ▶ Documentation
 - ▶ Hardware Survey
 - ▶ Compile your algorithm (PSA, Tracking)

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ General services
 - ▶ Documentation
 - ▶ Hardware Survey
 - ▶ Compile your algorithm (PSA, Tracking)
- ▶ RUN Control

Xavier Grave

- ▶ General services
 - ▶ Documentation
 - ▶ Hardware Survey
 - ▶ Compile your algorithm (PSA, Tracking)
- ▶ RUN Control
- ▶ GUI

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

Xavier Grave

- ▶ General services
 - ▶ Documentation
 - ▶ Hardware Survey
 - ▶ Compile your algorithm (PSA, Tracking)
- ▶ RUN Control
- ▶ GUI
- ▶ Analysis of Legnaro data using the current NARVAL implementation

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

Xavier Grave

Presentation

Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation

Global scheme

Some photos

DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ To be added to Data Flow and tested :

Xavier Grave

Presentation

Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation

Global scheme

Some photos

DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ To be added to Data Flow and tested :
 - ▶ Event Builder

Xavier Grave

Presentation

Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation

Global scheme

Some photos

DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ To be added to Data Flow and tested :
 - ▶ Event Builder
 - ▶ Tracking

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ To be added to Data Flow and tested :
 - ▶ Event Builder
 - ▶ Tracking
 - ▶ Storage actor (GANIL/LPC based one)

Xavier Grave

[Presentation](#)
[Overview](#)

[NARVAL News](#)

[Legnaro Installation](#)
[Report](#)

[DAQ hardware](#)
[organisation](#)
[Global scheme](#)
[Some photos](#)
[DAQ software](#)
[organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

- ▶ To be added to Data Flow and tested :
 - ▶ Event Builder
 - ▶ Tracking
 - ▶ Storage actor (GANIL/LPC based one)
- ▶ To be developed :

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ To be added to Data Flow and tested :
 - ▶ Event Builder
 - ▶ Tracking
 - ▶ Storage actor (GANIL/LPC based one)
- ▶ To be developed :
 - ▶ Prisma merger

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

- ▶ To be added to Data Flow and tested :
 - ▶ Event Builder
 - ▶ Tracking
 - ▶ Storage actor (GANIL/LPC based one)
- ▶ To be developed :
 - ▶ Prisma merger
- ▶ Disk servers

Xavier Grave

[Presentation](#)
[Overview](#)

[NARVAL News](#)

[Legnaro Installation](#)
[Report](#)

[DAQ hardware](#)
[organisation](#)
[Global scheme](#)
[Some photos](#)
[DAQ software](#)
[organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

- ▶ To be added to Data Flow and tested :
 - ▶ Event Builder
 - ▶ Tracking
 - ▶ Storage actor (GANIL/LPC based one)
- ▶ To be developed :
 - ▶ Prisma merger
- ▶ Disk servers
 - ▶ 60 TB to be physically installed (in Tier 2 room)

Xavier Grave

[Presentation](#)
[Overview](#)

[NARVAL News](#)

[Legnaro Installation](#)
[Report](#)

[DAQ hardware](#)
[organisation](#)
[Global scheme](#)
[Some photos](#)
[DAQ software](#)
[organisation](#)

[DAQ Control](#)

[Demonstration](#)

[Todo list](#)

- ▶ To be added to Data Flow and tested :
 - ▶ Event Builder
 - ▶ Tracking
 - ▶ Storage actor (GANIL/LPC based one)
- ▶ To be developed :
 - ▶ Prisma merger
- ▶ Disk servers
 - ▶ 60 TB to be physically installed (in Tier 2 room)
 - ▶ need for formatting and GPFS installation

Xavier Grave

Presentation
Overview

NARVAL News

Legnaro Installation
Report

DAQ hardware
organisation
Global scheme
Some photos
DAQ software
organisation

DAQ Control

Demonstration

Todo list

All DAQ related information should be found at :
<http://csngwinfo.in2p3.fr>