

Usage of CC-IN2P3

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Calcul ATLAS France (CAF) meeting
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- **Pledge of CC-IN2P3 as a Tier-1 (see [cric](#))**

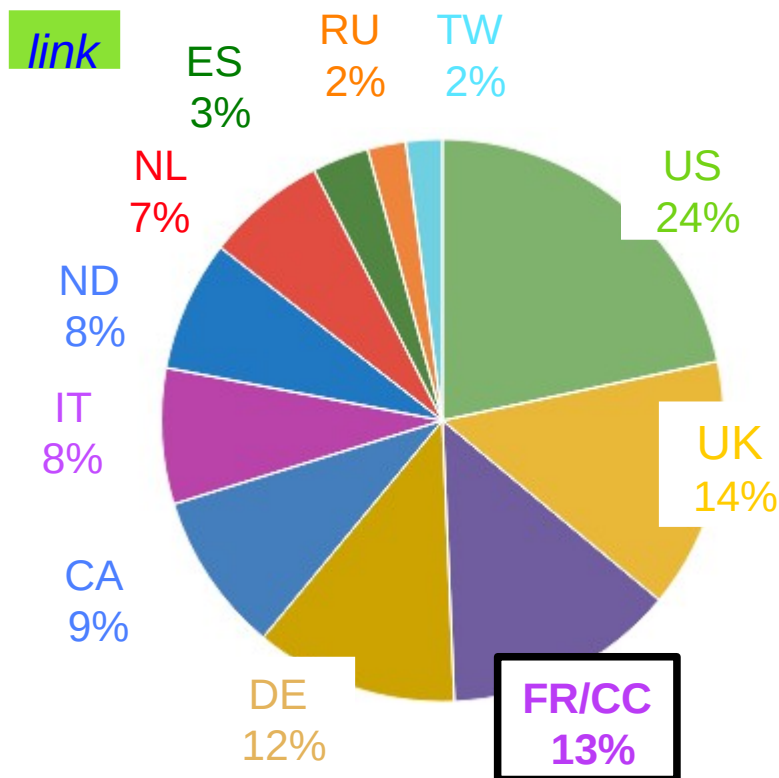
- in 2021 represents 12.3% of disks and 13.9 % of tapes
pledge increased by 17% in 2021
- in 2022 represents 14.8% of disks and 14 % of tapes expected pledges
pledge increased by 28% for disk and 17% for tapes

	Pledge 2020 (TB)	Pledge 2021 (TB)	Pledge 2022 (TB)
Disk	11100	14175	16240
Tape	28700	33605	40256

- **LOCALGROUP [current]**

- non pledged, accessed from grid/batch
- list of main users .xlxs on agenda
- pledge not increased in 2021 / 2022

	Total (TB)	Free (TB)
DISK	520	200
TAPE	350	



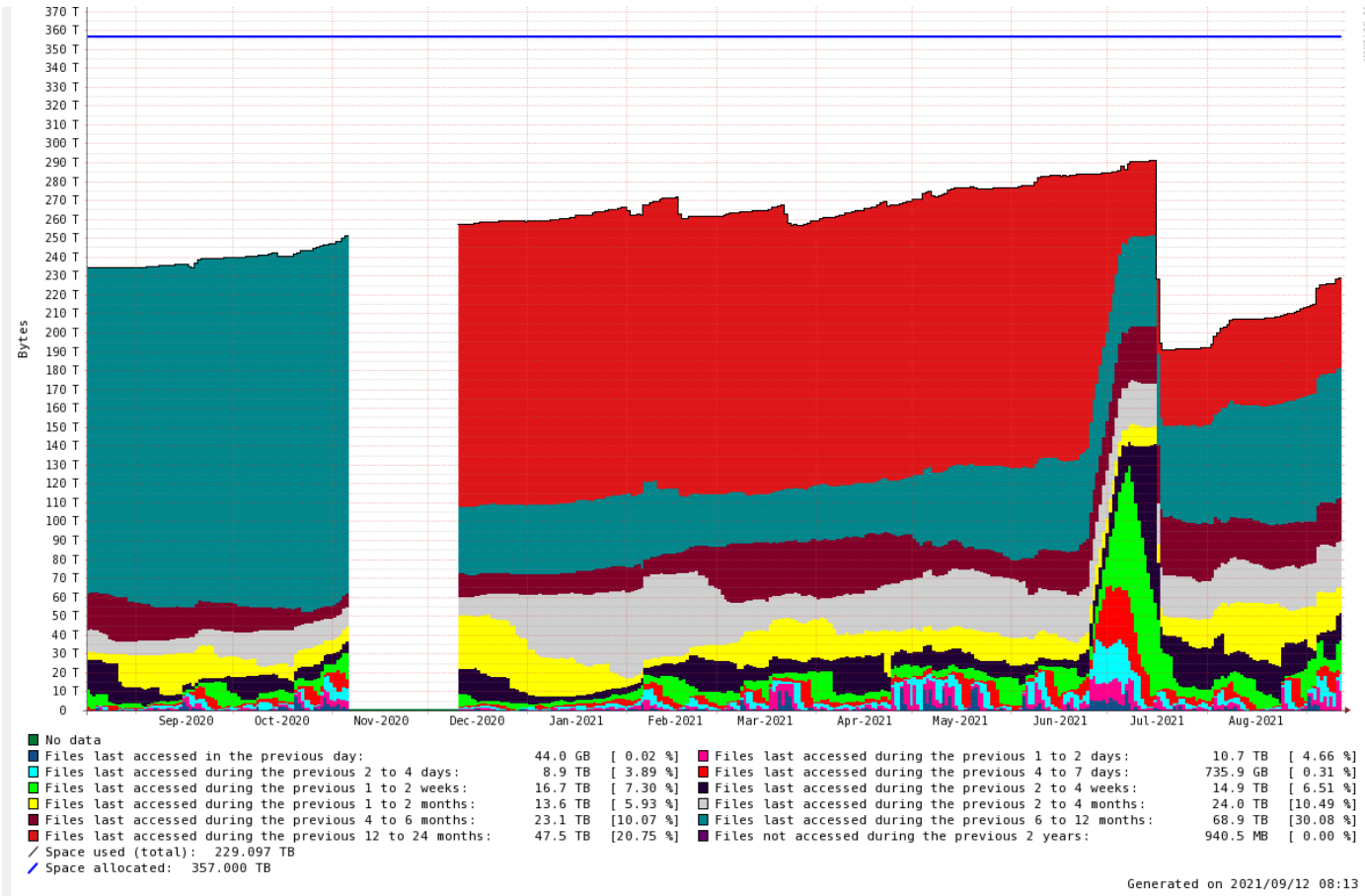
- **semi-permanent sps (see [link](#))**

- accessed from batch/interactive
- list of main users ([link](#)) + .xlxs on agenda
- data not accessed since a year
moved to ATLASLOCALGROUPTAPE
- pledge not increased in 2021 / 2022

	Total (TB)	Free (TB)
sps	360	130

- semi-permanent sps (see [link](#))

- ~50 TB not accessed for more than six months



- data not accessed since a year moved to ATLASLOCALGROUPTAPE
- list of main users ([link](#)) + .xlxs on agenda + list of old directories/users to be removed ⇒ to be redone by the end of the year ...

● IN2P3-CC_LOCALGROUPDISK

- 525 TB allocated, 364 TB used
- list of main users https://rucio-ui.cern.ch/r2d2/manage_quota + .xlsx on agenda
 - ⇒ 1 user with 105 TB
 - 1 user with 69 TB
 - 1 user with 59 TB
 - ⇒ 8 users with >10 TB occupy most of place
 - ⇒ a bit of cleaning ?

● IN2P3-CC_LOCALGROUPTAPE

- 357 TB allocated, was 250 TB last year
- list of main users https://rucio-ui.cern.ch/r2d2/manage_quota + .xlsx on agenda
 - ⇒ 1 user with 161 TB

- **local batch system**

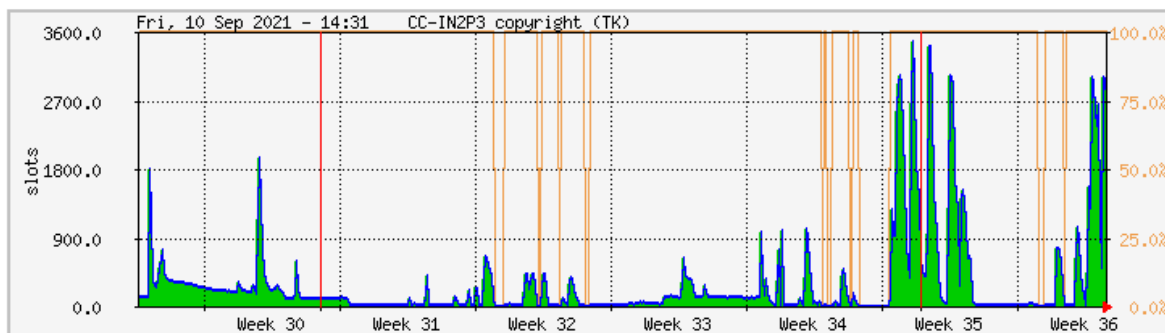
- cluster separated from grid one
- pledge ~500 jobs but up to 3500 jobs
- no priorities within ATLAS jobs first arrived first served

<https://portail.cc.in2p3.fr/>

- **running and requested jobs accessing sps**

- ~3% of ATLAS CPU at CC-IN2P3

Monthly Graph (2 Hour Average)



	Max	Average	Current
atlas project used slots:	3455.0	285.0	2686.0
atlas group used slots:	3455.0	285.0	2686.0
Percentage	100.0 %	100.0 %	100.0 %

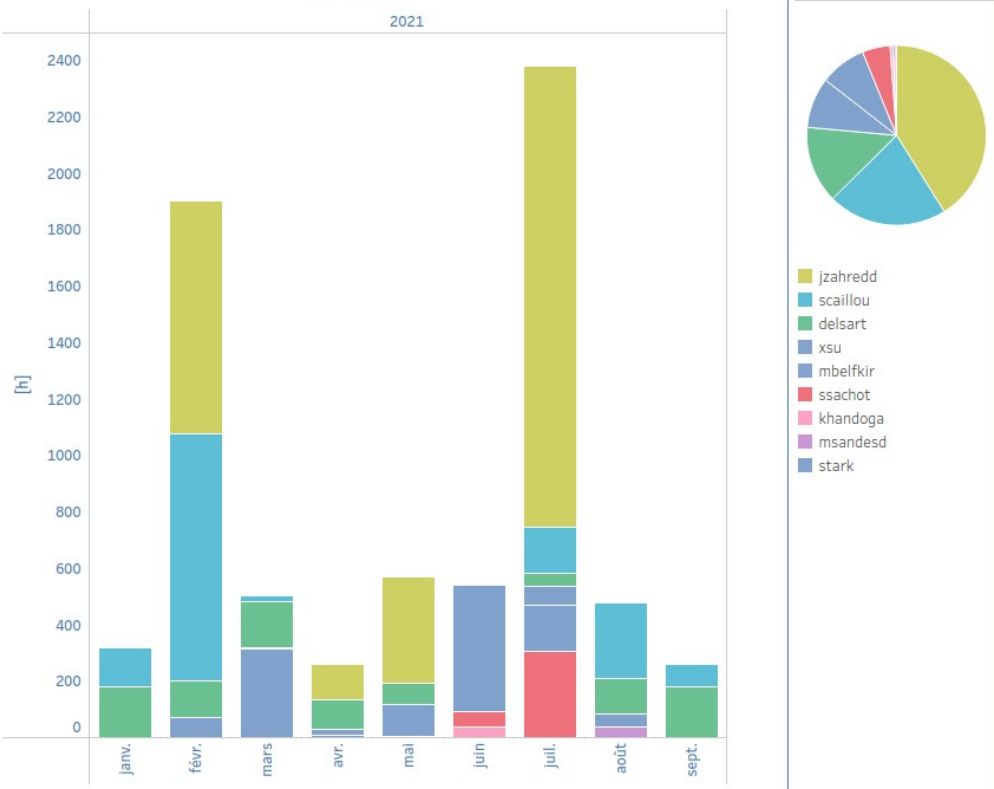
http://cctools.in2p3.fr/mrtguser/mrtguser/atlas/sge_project_atlas_atlas.html

https://portail.cc.in2p3.fr/graph/conso_group

GPU consumption per user

Group : atlas

2021



● Request 2020

- 4 GPU-year, ~0.5 per lab
- 35kh or ~400h per lab

● Realized 2020

- 9 users in total
 - 3 users=90% of usage
- 4600h used
 - 13% of our request

● Request 2021

- 2 GPU-year, ~0.25 per lab
- 17kh or ~200h per lab, or 1400h/month

● Realized 2021 (Jan-Sep)

- 9 users
- ~7200h used, ~60% of our request on this period which includes a peak of usage in Feb. and July.

==> keep same request as last year

- **HPC cluster @CC-IN2P3**

- no request was done for 2020
- usage for a PhD student at LPNHE
 - private MC event generation on different generators
 - « benchmarks » producing 10k events for each type
 - 1) A tarball for each $Z(qq)+jets$ setup is integrated.
 - 2 setups ($1j@NLO+3j@LO$, $1j@NLO+4j@LO$)
 - Multicores are used for a single job.
 - $1j@NLO+3j@LO$ setup: 16 cores are used, the integration can be done within 7 hours.
 - $1j@NLO+4j@LO$ setup: 16 cores are used, the integration can be done within 12 hours.
 - 2) 10k events are generated for each setup using the tarball. Signal core is used for a single job.
 - in May 19 000 HS06, 2% of ATLAS-FR users
 - may be some more setup, but no massive production