



Winter shutdown preliminary plan



SSD/SDD:

- Periodic Maintenance and pump replacement and implementation of the pressure regulators ramp (3-9 February 2012)

SPD:

- Pipes disconnection in front of the magnet (15th December)
- New Pipes installation in front of the magnet (15-17th December- see next slide)
- Periodic Maintenance and UPS integration and test (6th January)
- Back pressure regulators installation and tests (beginning of February?)
- Filters drilling: tbd



SPD Winter shutdown planning



	Dec				Jan					Feb			Mar	
Wk	49	50	51	52	1	2	3	4	5	6	7	8	9	10
Mo	5	12	19	26	2	9	16	23	30	Maint. + 6	13	20	27	5
Tu		Gen. Power test								Pump replac .+ Preg Ramp				
We	Chilled W. Test													
Th														
Fr														
Sa														
Su			Xmas Day	NY Day										

TRD

No access to the cavern: 13 Jan 2012 and 25 Feb 2012

EmCal

No access to PP4: 16-17 Dec 2011 and 6-7 Feb 2012

Shielding

Access allowed after 6 pm: from 8th to 15th December 2011
and from 13th to 17th February 2012

Contingency



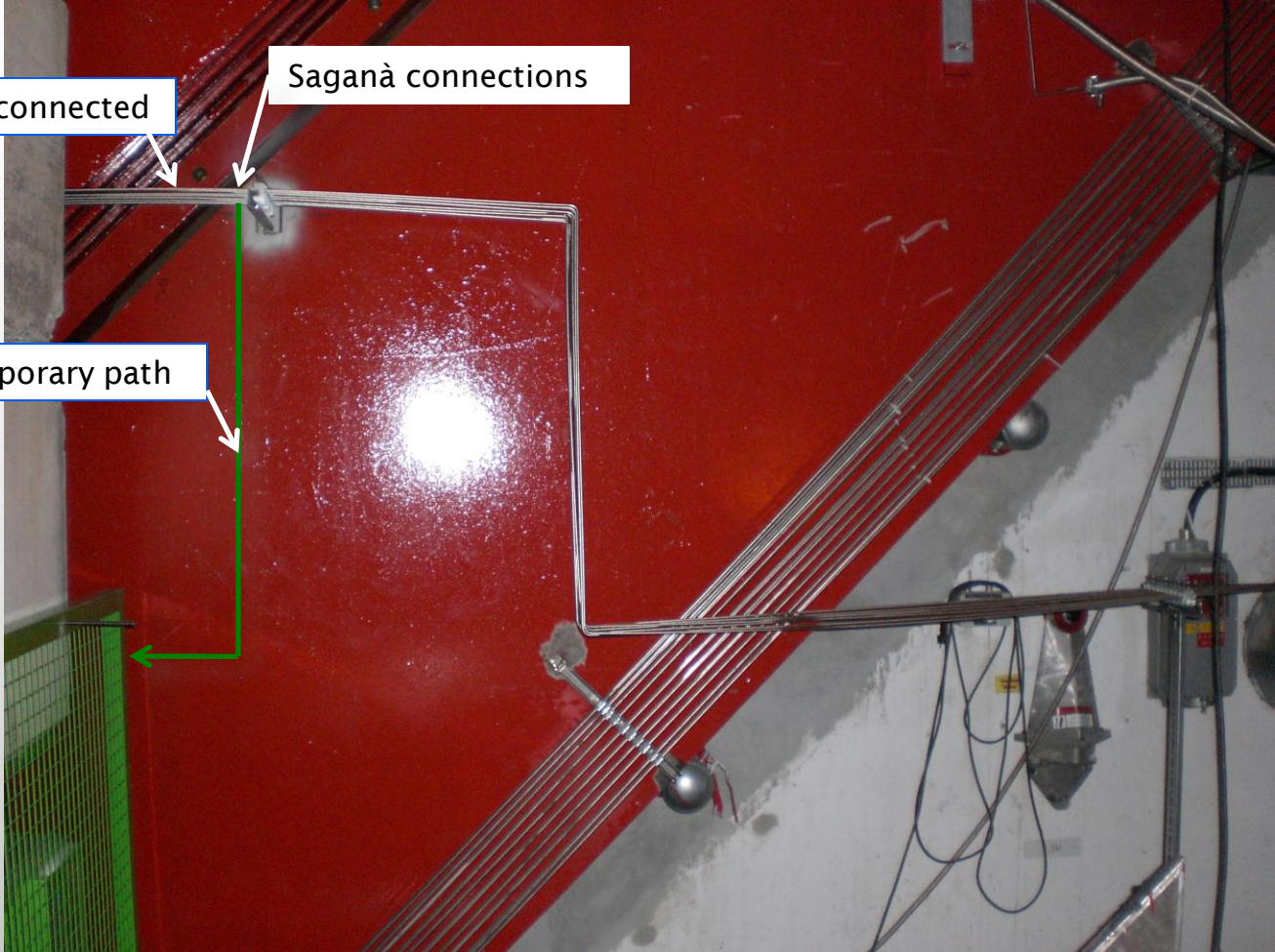
Pipes temporary installation



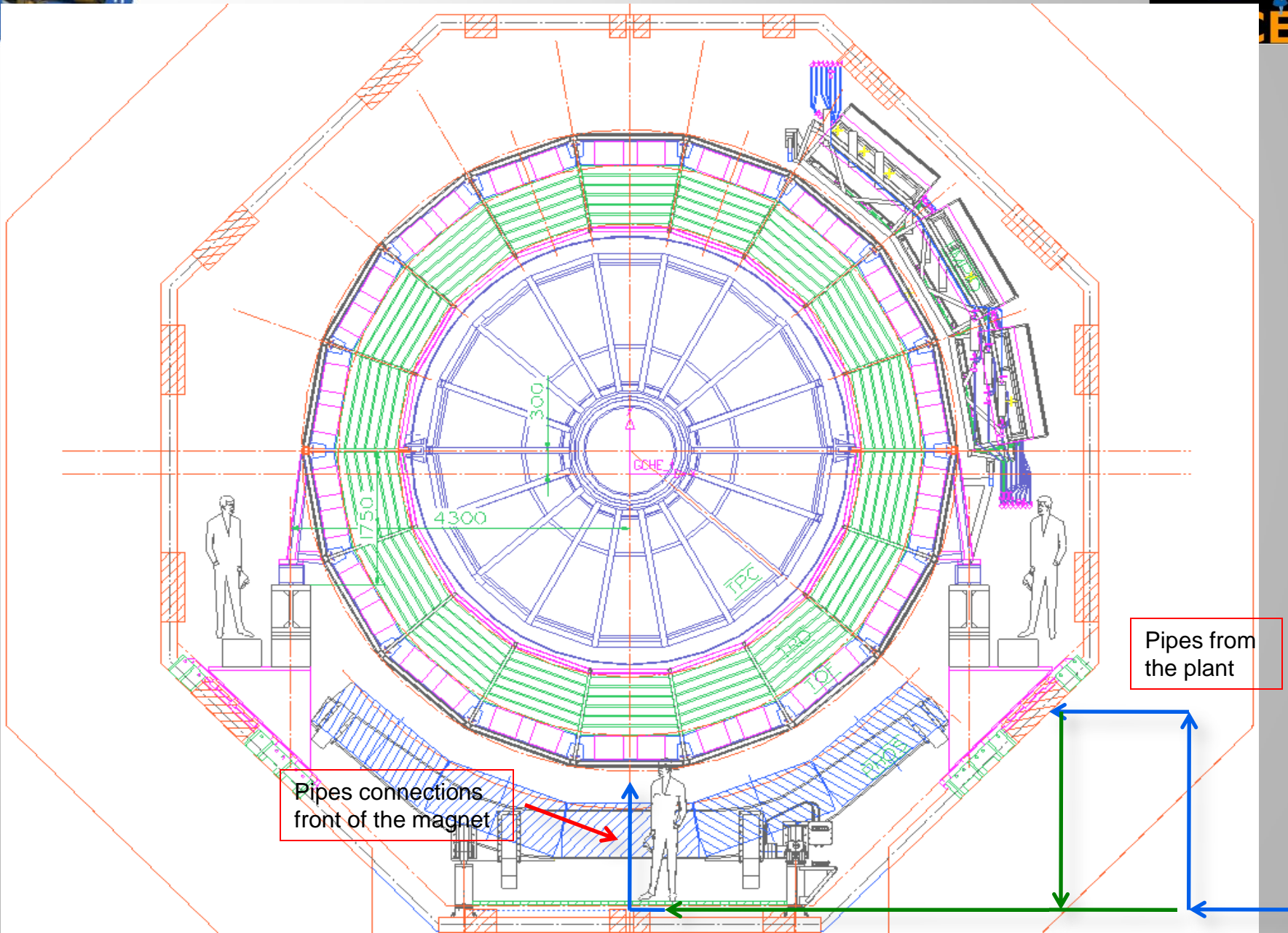
Pipes to be disconnected

Saganà connections

New pipes temporary path



Pipes path





Mechanical drilling tests



Y. Lesenechal started some tests last week (drill, twisted wire and a lot of patience):



$\varnothing \sim 1,2 \text{ mm}$



Twisted wire + carbide milling tool welded on the head



Issues still open

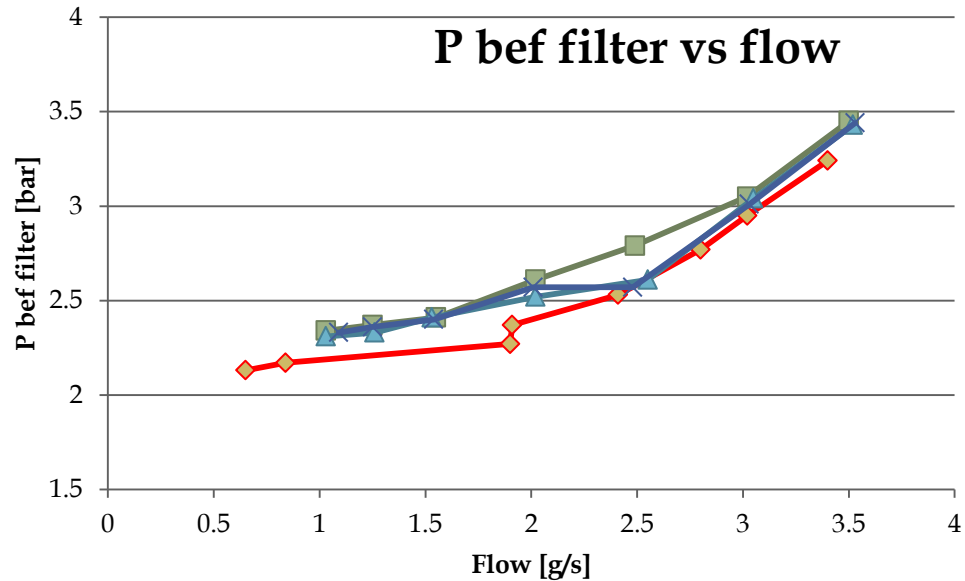
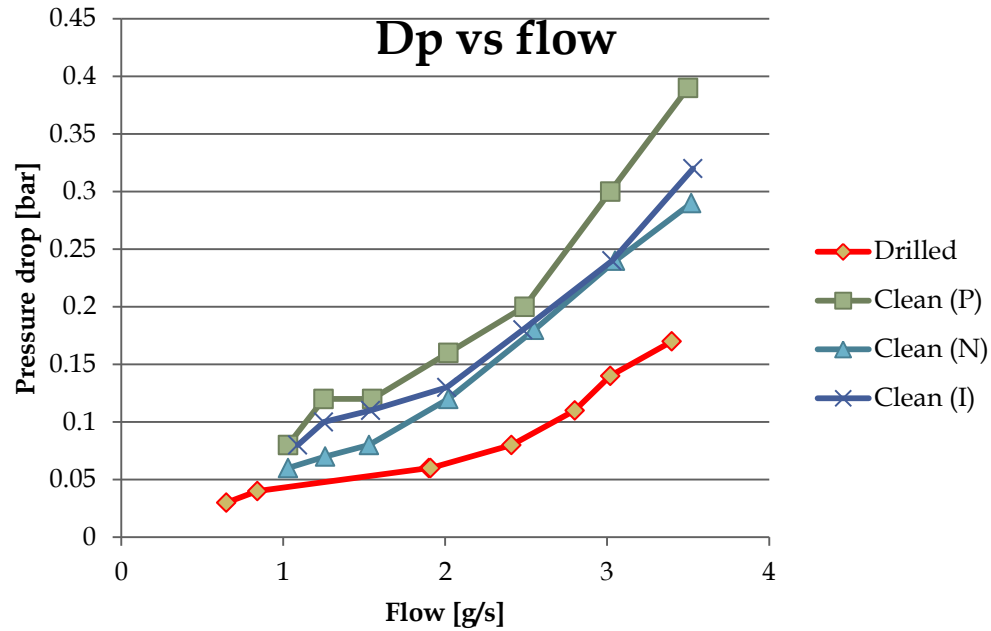


The procedure has to be improved:

- To tune the force applied to the filter (the twisted wire can be broken inside the pipe)
- To test the cleaning effect using C6f14 and the cleaning machine in counter flow (or aspiration after the drilling using peek mini-pipes...)
- To reproduce the results many times in order to optimize the tools
- To drill the filters in the lab many times in order to find a precise procedure
- To measure the pressure drop after the drilling: **DONE (next slide)**



Flow test result





SPD Winter shutdown planning



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Tu		Recovery	Drilling ?							Pipes Connect				
We	Chilled W. Test		Drilling ?		SPD Filters drilling and cleaning (starting 5 th January)						SPD			
Th	Recovery	Pipes Discon + new pipes install.			Bp regulators installation (tbd)						Commissioning			
Fr	Recovery				SPD maintenance									
Sa	Recovery													
Su	Recovery		Xmas Day	NY Day										

TRD

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Shielding

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Contingency