



Minutes

Injector Section Meeting 6/2013

17. Mai 2013
10:30 – 12:00

24/200



Chair: Frank Brinker

Draft: Armin Brand

Agenda

<https://indico.desy.de/conferenceDisplay.py?confId=8005>

1.	Elektronik Racks unter 1.3 Ghz Modul	
2.	Kabeltrassen in XTIN	
3.	Ergebnisse der Vermessung XTIN	
4.	Laserbeamline für Laser Heater	
	Protokoll (wird zu einem späteren Zeitpunkt eingestellt)	A. Brand

Dokumente

!!XFEL-Injektor_Sektion_Meeting..pdf	7+6UG IT-Trassen XTIN.pdf	E-Durchbruch 7UG_XTIN.pdf
Ergebnisse2_XTIN.ppt	Installation in XFEL Injector 16.05.13.pdf	Kranbahn 7 UG_XTIN.pdf
Laserbeamline_im_XFEL-Injektor_Sektion_Meeting....pdf	X-TIN 7UG-Kran.jpeg	

Participants

Brand (TC), Brinker (TC), Gerth (18), Gubanova (01), Herrmann (34), Keese (MVS), Klemz (FS-LA), Ladwig (34), Lederer (19), Liebing (MDI 5), Lipka (17), Näser (MKK6), Negodin (TC), Nölle (17), Oliwa (02), Peier (18), Prenting (32), Rathjen (38), Sokolinski (MDI 5), Sommer (MVS), Stock (34), Wierba (02), Widhalm (MKK 1),

1. Elektronik Racks unter 1.3 GHz Modul

W.Wierba reported the present status of the rack installation under the 1.3 modules. At the sidelines he mentioned, that the cooling capacity of the machine obtain 6 to 7 KW, but only 3KW will be necessary.

Page 4: In that place 16U racks will be used by MSK. The maximum depth will be 1.000mm. If a higher depth should be requested, please contact W.Wierba asap.

Page 5: Different as in the picture of the racks cabinets showed, the UPS will be placed elsewhere thus saving one Rack. By this the 3 Units with 3 Racks plus cooling unit should be sufficient for the foreseen electronics.

The limit of temperature will be not higher than 40°. The water inlet will be 20° and the output will be 30°.

E.Negodin *Do we have any limitation for cooling water?*

F.Brinker *This question should be discussed separately with J.-P. Jensen (MKK).*

Page 8: In the lower part of the picture the 16U cabinets will be shown under the module. There will be approximate 200 cables above the racks, connected from a patch panel to the module. The high amount of cables came from the redundancy of the system.

W.Wierba *From the racks, we have to move with the cables into the media shaft. With whom I have to discuss the cable trays?*

There will be a follow up in the next meeting

Page 10: Beneath the radiation shielding there will be a cable space from 15-18 cm.

There will be 3 patch panels for each module. 1 is placed next to the racks and the other two are located on both sides of the module.

Above the racks is a copper water pipe located. A rubber pipe should be requested for the main connection of the water pipes.

E.Negodin *Is it sure, that there will be no fire distinction is required?*

W.Wierba *Will check this with D5*

2. Kabeltrassen im XTIN

Additional cable trays are needed for IT, interlock and diagnostics.

J.Widhalm presented some slides with a draft of cable trays. There will be 3 trays

between the wall and the crane track. 2 x 200mm trays for IT and 1 x 300mm tray for Interlock.

In the present model there is a collision with the TDS waveguides. J.Widhalm asked if the wave guide for the TDS on its present position could be moved a little lower. F.Brinker decided to make a special meeting for this question.

A cable tray on the floor was discussed again which is shown in the present 3D model. (It figured out after the meeting that this tray is outdated)

N.Meyners *There was a decision some time ago, that we won't have trays on the floor, because we would lose the walk ways.*

D.Nölle *Why couldn't we place the trays next to the girder?*

F.Brinker *This might be possible, but a solution on the floor below a gangway could be easier.*

3. Ergebnisse der Vermessung XTIN

J.Prenting presented the results of the measurement of the XTIN.

J.Prenting *The measurement of the machine is 15mm lower than expected at the position of the exit hole from XTIN to XSE.
Should the machine be raised up this 15mm?*

F.Brinker *We prefer to keep it as it is.*

J.Prenting showed a 3D tool which allows to measure any distance in the tunnel. The tool is free for any browser and it doesn't need a special program. Just use the following link:

<http://131.169.41.123:8400>

4. Laserbeamline für Laser Heater

G.Klemz prepared a talk about the collisions of TDS-Water cooling and the GUN-Laser consoles.

G.Klemz was so kind and summarize the main problems as followed:

Die in der Laser Heater Beamline der schwedischen Kollegen vorgesehenen und im DESY JT-Modell des Injektorgebäudes noch nicht gezeigten Vakuumpumpen kollidieren mit einigen Kühlwasserleitungen, vgl. S. 4 bis 6 im Anhang. Mögliche Lösungen sind Montage der Pumpen ober- statt unterhalb der Laser Heater Beamline, bzw. Verlegen der Kühlwasserleitungen.

Zusätzliche Frage: Kollidieren die Kühlwasserleitungen mit dem auf S. 6 gezeigten, an der Wand montierten Stützträger ? Die derzeitige Trassenführung dieser Wasserleitungen stammt von Roland Firchow, MKK.

Mitteilung zur Injektor-Laser Beamline:

Anhang, Seite 7: Die noch nicht im JT-Modell vorhandene Laser beam line zum Photoinjektor wird im Mediensschacht ebenfalls vom 5.UG kommend parallel zur Beamline fuer den Laser Heater verlaufen, ebenso an einer Wand im UG 07. Vor dem ersten Kryomodul wird sie ueber einen Träger ähnlich dem für den Laser Heater geplanten (vgl. Anhang, S.8) gezeigten von der Wand zum Injektor geleitet. In der Nähe des Injektors wird Platz für die Strahlformende Blende und Ihre optische Abbildung auf die Photokathode benötigt, (z.B. optischer Tisch)