## 2023-04-09 Fred, Denis, Olli

- UT2h30 arrival in the lab. Clouds and humidity
- STS fringes are very poor on B2. Even with a reinit of the FTT, PDC and DDL nothing is changing. Fringe contrast on B1B2 abd B2B3 is very poor. Fringes on B3B4 and other are good. We started the sequence of recording.
- BIAS, DISP, KAPPA, STS6T recorded in LR
- UT5h00 humidity is still very high (80/90). We have stopped all the servers and all the hardware and restarted everything, but the fringe contrast is always very low with B2 with respect to the others. Fringes look ok on MIRCx on all baselines. Very strange...
- UT7h45, finally RH is down enough and we open on HD147394.
- Uh8h10 fringes on MIRCx much better than yesterday
  - o S1=-0.95, S2=-1.48, E1=1.51, E2=0.31
- Fringes S2S1 found on SPICA but with DL4=12668 and DL5=13140 so coherent with yesterday but this is very strange as DL4 is not where the STS pos is sending it (DL4=14444)
- Correction of the VLDC5 from 5.2 to 6.2. DL5=12955 at the end.
- S1=-1.12, S2=-1.72, E1=1.24, E2=-0.23
- There is a bug when sending the offsets to the DL server. So offsets should be sent when the chromatism is not considered.... To be corrected.
- Franges S1S2 at 14444&14726 now
- Franges B2B4B5 on HD160762 with 5.8/3.5/6.2 for VLDC and DL 14548/14445/14762
- After correction of fixed dispersion we have the following situation
  - o 0-VLDC 2.5/3.5/6.2 and offsets DL 15212/14445/14730
  - Fringes W2S2S1 on B2B4B5
- Fringes E1E2 (B1B6) seen on SPICA during MIRCx scan. But nothing seen when fringes were locked on MIRCx and with a scan on SPICA.
- UT11h30 we move to HD184006
- -1.09/-1.53/0.21/-0.71
- Fringes B1B6 on SPICA with DL1=10323/DL6=17280. VLDC 5.0/3.9
- -1.26/-1.80/-0.09/-1.11
- Record mircx /data1/data/2023Apr09 (5T with LDC corrections and GDT tracking)
- Record spica 20 files of 1000 frames (S2S1 and E1E2 on SPICA with LDC/VLDC/DDL active). DL16 10323/17288 DL45 14445/14602 (DL2=15196). Fringes E1E2 with 20μm of drift in 10 files
- New scan on W2 to try to have the E2W2 or E1W2 fringes
- HD184006 UT 13h00
- Corchro=2000/0/0/1877/2060/1797
- Vldc 7.5/12/4.8/6/8.7/6.4
- Ldc 12.05/39.9/0/13.9/11.4/14.8
- (screeshot of spica\_ople to be analyzed)
- Maybe the DL correction is not in the correct direction. We have some drift (220μm of motion) on E1E2 clearly and on W2S2 it has been very hard to find again the fringes and for the first fringes the difference was really important with respect to the predicted values.
- Todolist

- o Check fringes S1S2 again and try to optimize the OVLDC to reduce the dispersion.
- o Find S2W2 which will give W2S2S1 at the end.
- o Optimize OVLDC and record at different time.
- o Find E1W2 and E1E2 and optimize at each step.
- o Record MIRCx fringes for validation of dispersion
- When possible record 3T or 4T/5T fringes with SPICA.

## SPICA\_FT

- o ~spooler
- o Cdmirc
- cd mircx\_opdcontroller\_server/
- o ./bin/mircx\_opdcontroller\_server
- Mircx\_opdc\_rtd
- Mircx\_opdc\_gtk
- se MIRCx saturation.