17cm prime focus receiver, UBB (600-3000 MHz)

This is a new ultra broad band (UBB) 2-channel system covering a range from 600 to 3000 MHz. Be aware that there is also a lot of RFI in this range. The system is mainly used for pulsar observations.

Calibration Information

Frequency [GHz]	Channel	Polarisation	Tcal [K]	Tsys [K]	Sensitivity [K/Jy]	SEFD [Jy]	Aperture Eff. [%]	TMB/S [K/Jy]	Main Beam Eff. [%]	FWHM [arcsec]	Last update
0.85	A+B	LCP+RCP	97.0	48	1.25	38	44			930	Sep 2012
1.4	A+B	LCP+RCP	188.0	56	1.25	45	44			650	Sep 2012
2.35	A+B	LCP+RCP	156.0	53	1.25	42	44			400	Sep 2012

normalized Gain curve (G = A0 + A1·Elv + A2·Elv2)			Observed in	confirmed
A0 = 1.0	A1 = 0.0	A2 = 0.0	Sep 2012	

Comments:

- New receiver, from 2012, preliminary data - more testing needed!

Version description for OBSINP

RX Name	Wavelength [cm]	Frequency (center) [GHz]	Nr. of Horns
P170mm UBB (0.6-3 GHz)	50.0-10.0	0.6-3.0 (1.8)	1
Version:	**Comment**		
1. Continuum/Line	Continuum and spectroscopy version		
2. Pulsar	Pulsar Version		
Horn offsets [arcsec]	0.0, 0.0		

Channel assignment in the MBFITS data files

Note that the narrow line and VLBA IF channels are usually only available when the specific line version of the receiver was selected. In addition for most receivers with narrow line channels the cables at the patch board need to be connected by the receiver group.

To select different channel numbers in OBSINP, the online plot, or the toolbox the numbers have to be specified like c(1)+c(2) to add channel 1 and 2. E.g. channel 1 and 2 contain the LCP and RCP broadband channels, then "OnlPlot pen='c(1)+c(2)'" or "toolbox use='c(1)+c(2)'" will select these channels. In OBSINP the pen can be directly specified in the receiver selection menu.

Abbreviations:
SB: narrow band channel (Schmalband-Kanal), 100 MHz band width

BB: digital broad band channel (Breitband-Kanal), band width varies for different receivers
VLBA: VLBA IF, 500 MHz band width
optical: optical fibre with 4 GHz of band width
BW: band width
TP: total power

P170mm UBB (0.6-3 GHz)			
Channel	**IF**	**Pol.**	**Comment**
1	optical	LCP	TP A
2	optical	RCP	TP B

Tcal and Tsys measurements

TODO