

ALMA Phase 1 Joint Receiver Work Program - Overview

Version 1.0 2 October 1999

No.	Work package	Lead by	WP manager	Participating institutions
4.1	Rx Subsystem design & spec		W. Wild and J. Payne	NRAO Tuc, NRAO CV, NOVA/SRON, IRAM RAL, MPIfR, OSO, HIA, OVRO, BIMA
4.2	SIS Junctions production study	IRAM	K. Schuster	IRAM, SRON-DIMES, KOSMA, OSO, NRAO
4.3	SIS mixers			
4.3.1	balanced, sideb-sep.	NRAO CV	A. Kerr	NRAO
4.3.2	submm bands	NOVA/SRON	W. Wild	NOVA/SRON, OSO, NRAO, DEMIRM
4.3.3	moving backshort	IRAM	B. Lazareff	IRAM
4.4	Amplifiers			
4.4.1	HFET/MMIC	NRAO CV	J. Webber	NRAO
4.4.2	IF amplifiers			
4.4.2.1	internal IF amplifiers	NRAO CV	J. Webber or S. Weinreb	NRAO
4.4.2.2	external IF amplifiers	CAY	A. Barcia	ETH, CAY
4.5	cryostat			
4.5.1	dewar	RAL/ATC	B. Ellison	RAL, ATC, IRAM, NRAO
4.5.2	cryocooler	RAL	T. Bradshaw	RAL, ATC, NRAO, IRAM
4.5.3	windows and IR filters	ATC/RAL	W. Duncan	ATC, RAL, IRAM, NRAO
4.5.4	prototype cryostat construction	US/Europe	TBD	NRAO, IRAM, RAL
4.6	optics			
4.6.1	receiver optics	IRAM	B. Lazareff	IRAM, MRAO, NRAO
4.6.2	LO injection	IRAM	M. Carter	IRAM, OSO, NRAO
4.6.3	feed horn fabrication	Arcetri	E. Natale	Arcetri, IRAM, MRAO
4.7	control & test electronics			
4.7.1	bias and monitor & control elec	NRAO Tuc	G. Moorey	NRAO, OSO, IRAM, ALMA software group
4.7.2	automatic testing	MRAO	S. Withington	OSO, MRAO, NRAO
4.8	Calibration equipment			
4.8.1	Rx calibration system	NRAO	D. Emerson	IRAM, NRAO, MRAO
4.8.2	183 GHz water vapor monitor	MRAO	R. Hills	MRAO, OSO, RAL
4.9	Antenna evaluation receivers	NRAO Tuc	G. Moorey	NRAO
5	Local oscillator subsystem			
5.1	LO subsystem design & spec	NRAO Socorro	D. Sramek	NRAO, RAL, MPIfR
5.2	LO reference	NRAO Tuc	B. Shillue	NRAO, RAL
5.3	multiplier chain LO	NRAO CV	J. Webber	NRAO
5.4	photonic LO	NRAO Tuc	J. Payne	NRAO, MPIfR/KOSMA, RAL