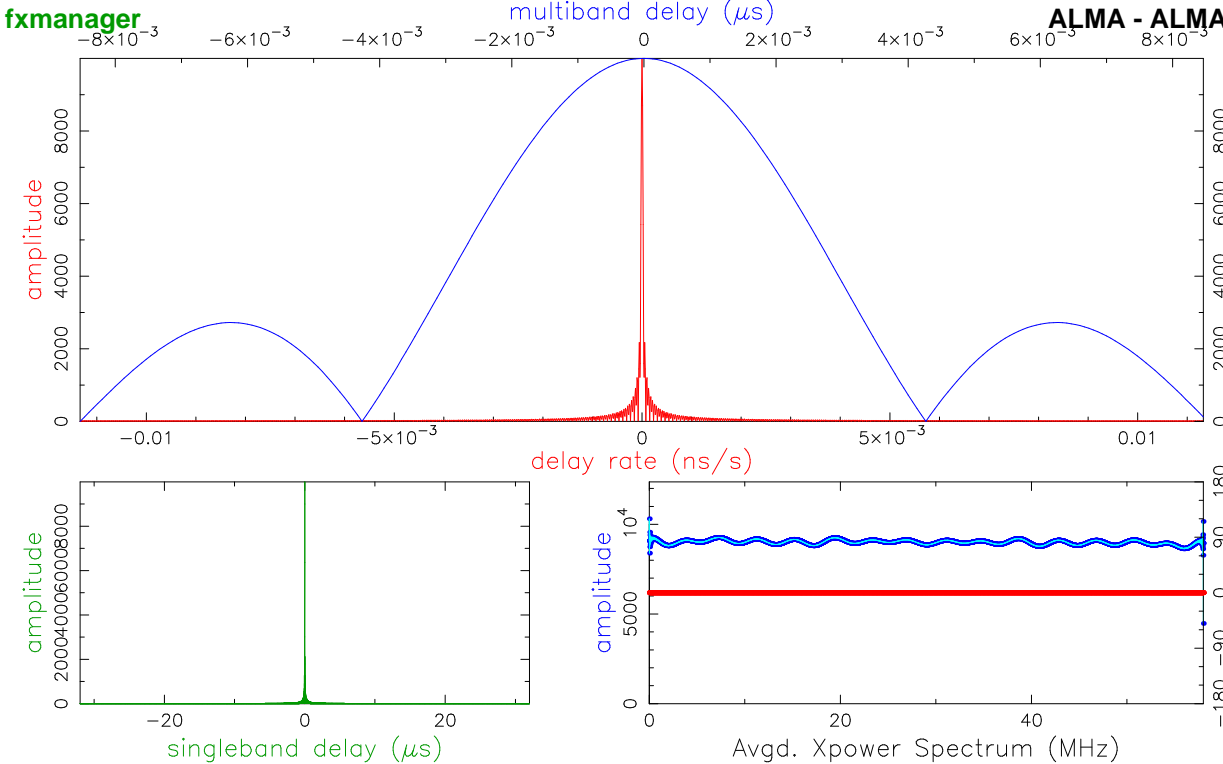


Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

1055+018.1RFZRA, No0017, AA

ALMA - ALMA, fgroup W, pol YY

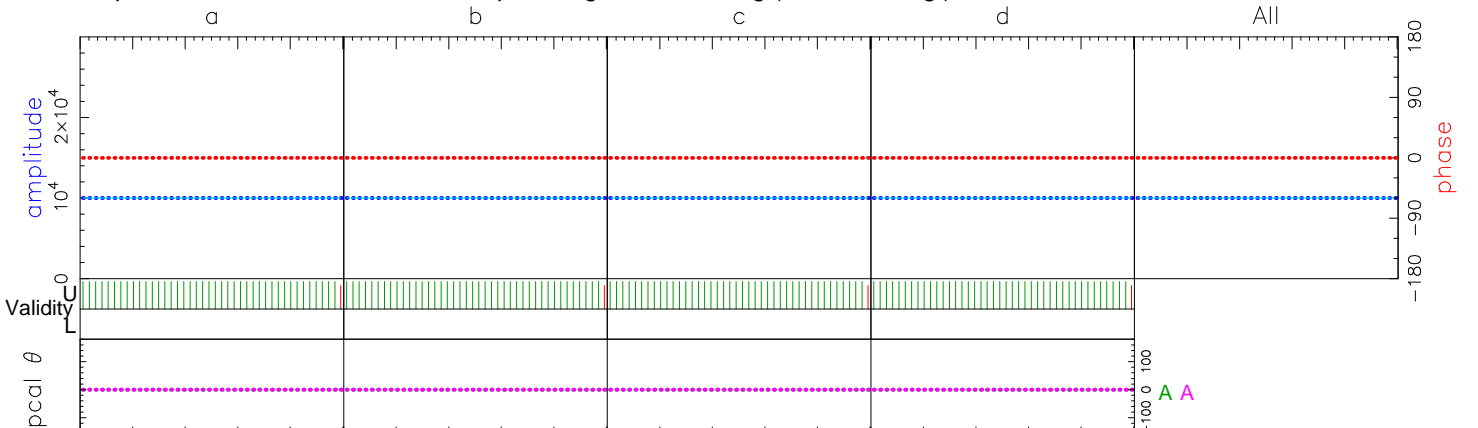


Fringe quality 9

SNR 318823.4  
 Int time 299.976  
 Amp 9999.999  
 Phase 0.0  
 PFD 0.0e+00  
 Delays (us)  
 SBD 0.000000  
 MBD 0.000000  
 Fringe rate (Hz)  
 0.000000  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512

Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065450  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	586/0	586/0	586/0	586/0		
A	0	0	0	0		
A:A	0:0	0:0	0:0	0:0		
A	1000	1000	1000	1000		
A	1000	1000	1000	1000		
A	W00UY	W01UY	W02UY	W03UY		
A	W00UY	W01UY	W02UY	W03UY		
Group delay (usec)(sbd)	0.000000000000E+00	0.000000000000E+00	0.000000000000E+00	0.000000000000E+00	0.000000E+00	+/- 7.6E-09
Sband delay (usec)	0.000000000000E+00	0.000000000000E+00	0.000000000000E+00	0.000000000000E+00	0.000000E+00	+/- 3.0E-08
Phase delay (usec)	0.000000000000E+00	0.000000000000E+00	0.000000000000E+00	0.000000000000E+00	0.000000E+00	+/- 1.2E-11
Delay rate (us/s)	0.000000000000E+00	0.000000000000E+00	0.000000000000E+00	0.000000000000E+00	0.000000E+00	+/- 6.7E-14
Total phase (deg)		0.0			0.0	+/- 0.0
Apriori delay (usec)					0.000000E+00	
Apriori clock (usec)					0.000000E+00	
Apriori clockrate (us/s)					0.000000E+00	
Apriori rate (us/s)					0.000000000000E+00	
Apriori accel (us/s/s)					0.000000000000E+00	
Resid mbdelay (usec)					0.000000E+00	
Resid sbdelay (usec)					0.000000E+00	
Resid phdelay (usec)					0.000000E+00	
Resid rate (us/s)					0.000000E+00	
Resid phase (deg)					0.0	
Pcal mode: MANUAL, MANUAL						
Pcal rate: 0.000E+00, 0.000E+00 (us/s)						
Bits/sample: 2x2						
Sample rate(MISamp/s): 116						
Data rate(Mb/s): 928						
nlags: 7424 t_cohere infinite						
ion window (TEC)						
sb window (us)					-32.000	32.000
mb window (us)					-0.009	0.009
dr window (ns/s)					-0.011	0.011
ion window (TEC)					0.00	0.00

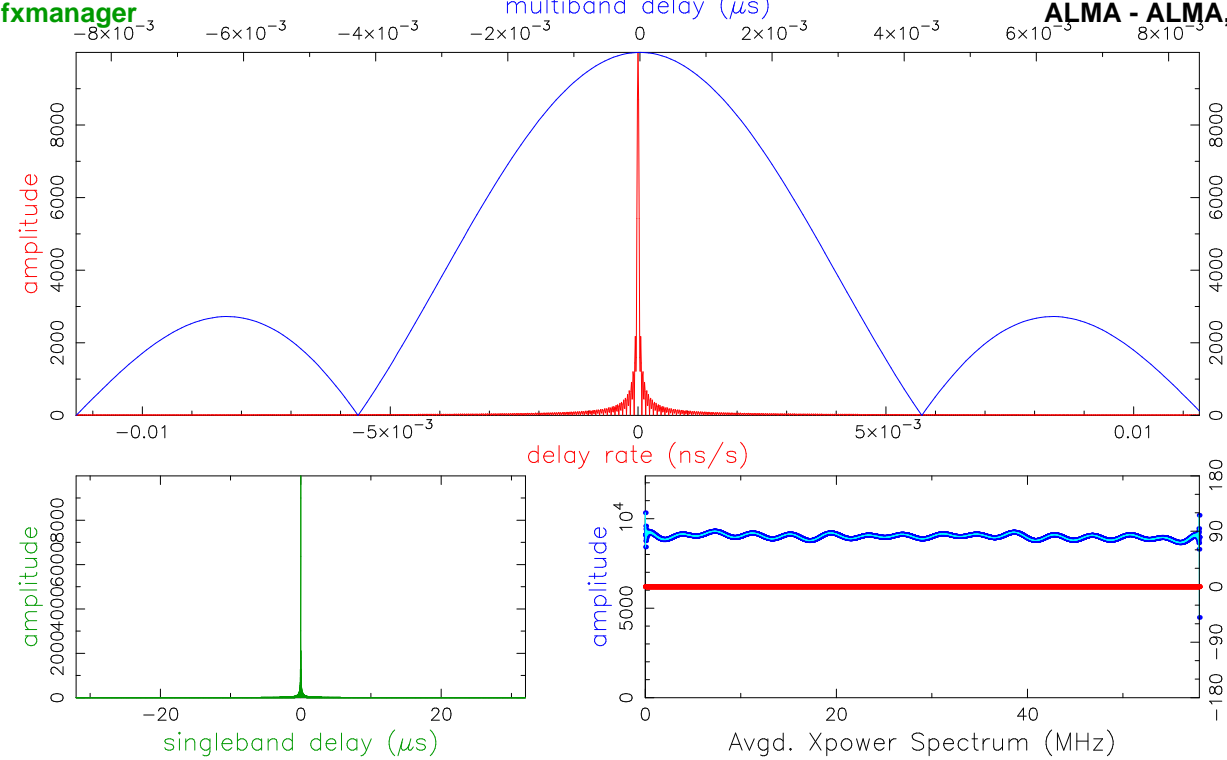
ph/seg (deg) 0.0 0.0 Search (2048X16) 9999.999 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 0.0 0.0 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -32.000 32.000  
 ph/frq (deg) 0.0 0.0 Inc. seg. avg. 10000.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009  
 amp/frq (%) 0.0 0.0 Inc. frq. avg. 9999.999 Sample rate(MISamp/s): 116 Data rate(Mb/s): 928 nlags: 7424 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 A: az 345.5 el 64.8 pa 166.7 A: az 345.5 el 64.8 pa 166.7 u,v (fr/asec) 0.000 0.000 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/AA..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/AA.W.18.1RFZRA

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

1055+018.1RFZRA, No0017, AA

ALMA - ALMA, fgroup W, pol XX

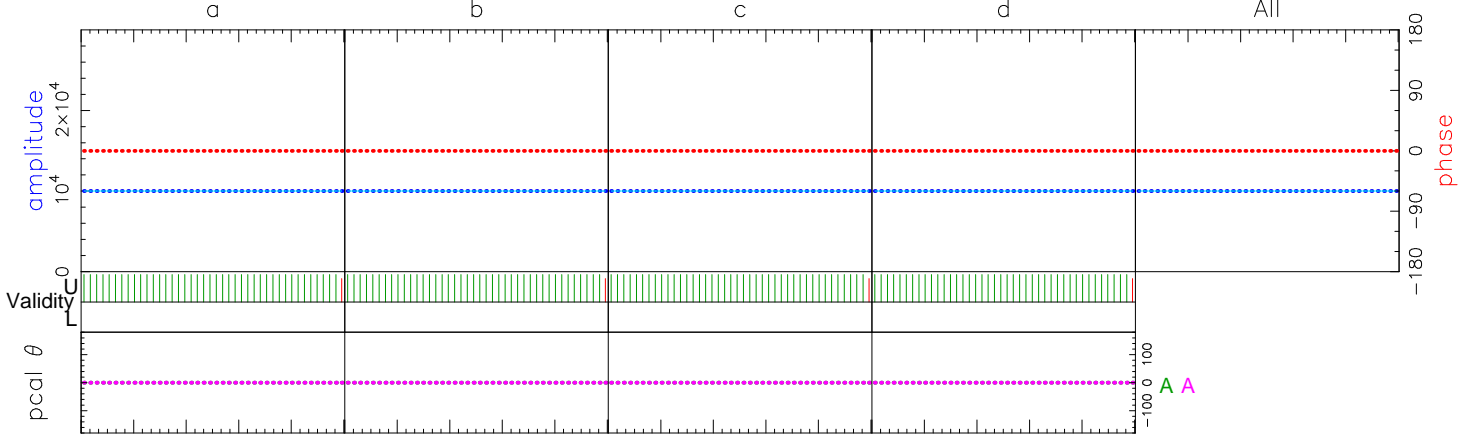


Fringe quality 9

SNR 318823.4  
 Int time 299.976  
 Amp 9999.999  
 Phase 0.0  
 PFD 0.0e+00  
 Delays (us)  
 SBD 0.000000  
 MBD 0.000000  
 Fringe rate (Hz)  
 0.000000  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512

Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065413  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	586/0	586/0	586/0	586/0		
A	0	0	0	0		
A:A	0:0	0:0	0:0	0:0		
A	1000	1000	1000	1000		
A	1000	1000	1000	1000		
A	W00UX	W01UX	W02UX	W03UX		
A	W00UX	W01UX	W02UX	W03UX		
Group delay (usec)(sbd)	0.0000000000E+00	0.0000000000E+00	0.0000000000E+00	0.0000000000E+00	0.00000E+00	+/- 7.6E-09
Sband delay (usec)	0.0000000000E+00	0.0000000000E+00	0.0000000000E+00	0.0000000000E+00	0.00000E+00	+/- 3.0E-08
Phase delay (usec)	0.0000000000E+00	0.0000000000E+00	0.0000000000E+00	0.0000000000E+00	0.00000E+00	+/- 1.2E-11
Delay rate (us/s)	0.0000000000E+00	0.0000000000E+00	0.0000000000E+00	0.0000000000E+00	0.00000E+00	+/- 6.7E-14
Total phase (deg)		0.0			0.0	+/- 0.0

ph/seg (deg) 0.0 0.0 Theor. Amplitude 9999.999 +/- 0.031 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 0.0 0.0 Search (2048X16) 9999.999 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -32.000 32.000  
 ph/frq (deg) 0.0 0.0 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009  
 amp/frq (%) 0.0 0.0 Inc. seg. avg. 10000.000 Sample rate(MISamp/s): 116 dr window (ns/s) -0.011 0.011  
 Data rate(Mb/s): 928 nlags: 7424 t\_cohere infinite ion window (TEC) 0.00 0.00

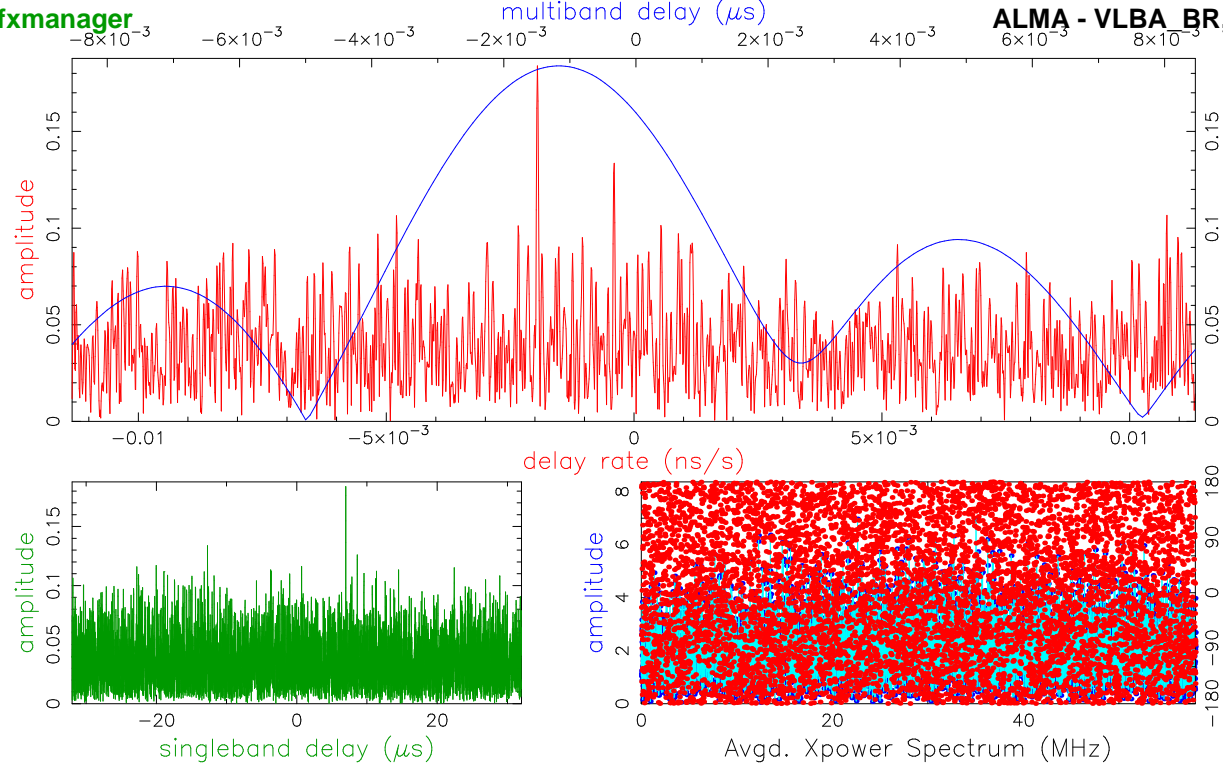
A: az 345.5 el 64.8 pa 166.7 u,v (fr/asec) 0.000 0.000 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/AA..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/AA.W.8.1RFZRA

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fxmanager

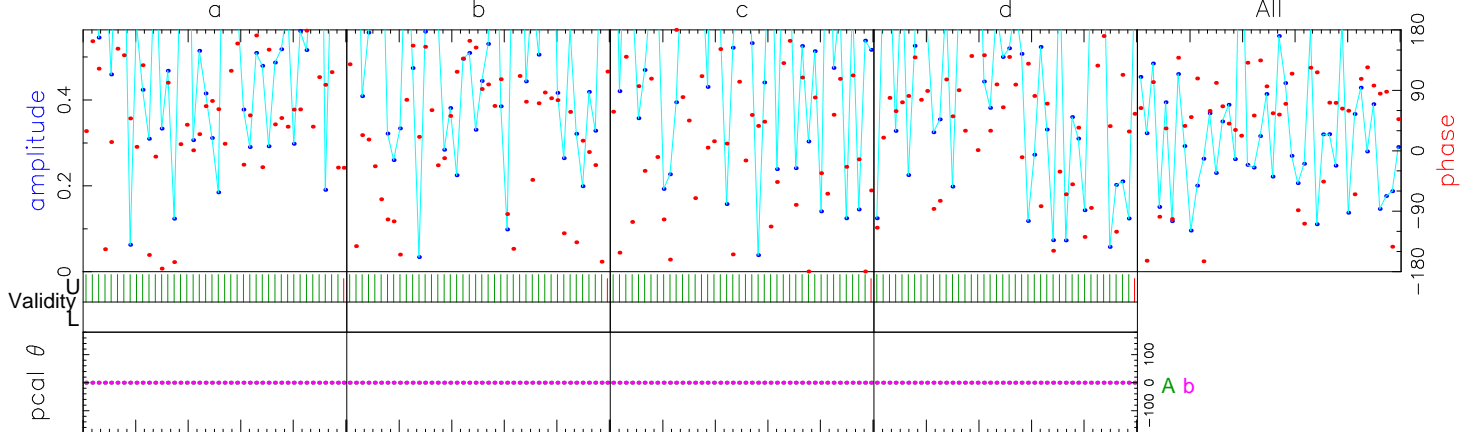
1055+018.1RFZRA, No0017, Ab

ALMA - VLBA BR, fgroup W, pol XL



Fringe quality 0  
 SNR 5.9  
 Int time 299.974  
 Amp 0.188  
 Phase -120.0  
 PFD 1.0e+00  
 Delays (us)  
 SBD 6.979699  
 MBD -0.001148  
 Fringe rate (Hz)  
 -0.167496  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065416  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	586/0	586/0	586/0	586/0		
A	0	0	0	0		
b	1000	1000	1000	1000		
A:b	0:0	0:0	0:0	0:0		
A:b	0:0	0:0	0:0	0:0		
A	1000	1000	1000	1000		
b	1000	1000	1000	1000		
A	W00UX	W01UX	W02UX	W03UX		
b	W01UL	W02UL	W03UL	W04UL		
Group delay (usec)(sbd)	6.67916630070E+03			6.67218718250E+03	Resid mbdelay (usec)	-1.14846E-03 +/- 4.1E-04
Sband delay (usec)	6.67916688153E+03			-2.1046143E+03	Resid sbdelay (usec)	6.97970E+00 +/- 1.6E-03
Phase delay (usec)	6.67218718497E+03			-1.1300001E-06	Resid phdelay (usec)	2.47243E-06 +/- 6.2E-07
Delay rate (us/s)	-9.06467013778E-01			-9.06465069321E-01	Resid rate (us/s)	-1.94446E-06 +/- 3.6E-09
Total phase (deg)		-155.9		-4.99109509070E-05	Resid phase (deg)	-120.0 +/- 19.4
Apriori delay (usec)						
Apriori clock (usec)						
Apriori clockrate (us/s)						
Apriori rate (us/s)						
Apriori accel (us/s/s)						
RMS	75.6					
Theor.	62.8					
Amplitude		0.188 +/- 0.032				
Search (2048X16)		0.180				
Interp.		0.000				
Inc. seg. avg.		0.203				
Inc. frq. avg.		0.178				
PCal mode: MANUAL, MANUAL						
PCal rate: 0.000E+00, 0.000E+00 (us/s)						
Bits/sample: 2x2						
Sample rate(MSamp/s): 116						
Data rate(Mb/s): 928						
PC period (AP's) 5, 5						
sb window (us)						-32.000 32.000
mb window (us)						-0.009 0.009
dr window (ns/s)						-0.011 0.011
ion window (TEC)						0.00 0.00

A: az 345.5 el 64.8 pa 166.7    b: az 125.0 el 28.9 pa -33.7    u,v (fr/asec) 5138.496 -10137.883    simultaneous interpolator  
 Control file: cf\_1234\_gmva    Input file: /Exps/c211d/v1/1234/No0017/Ab..1RFZRA    Output file: /Exps/c211d/v1/1234/No0017/Ab.W.10.1RFZRA

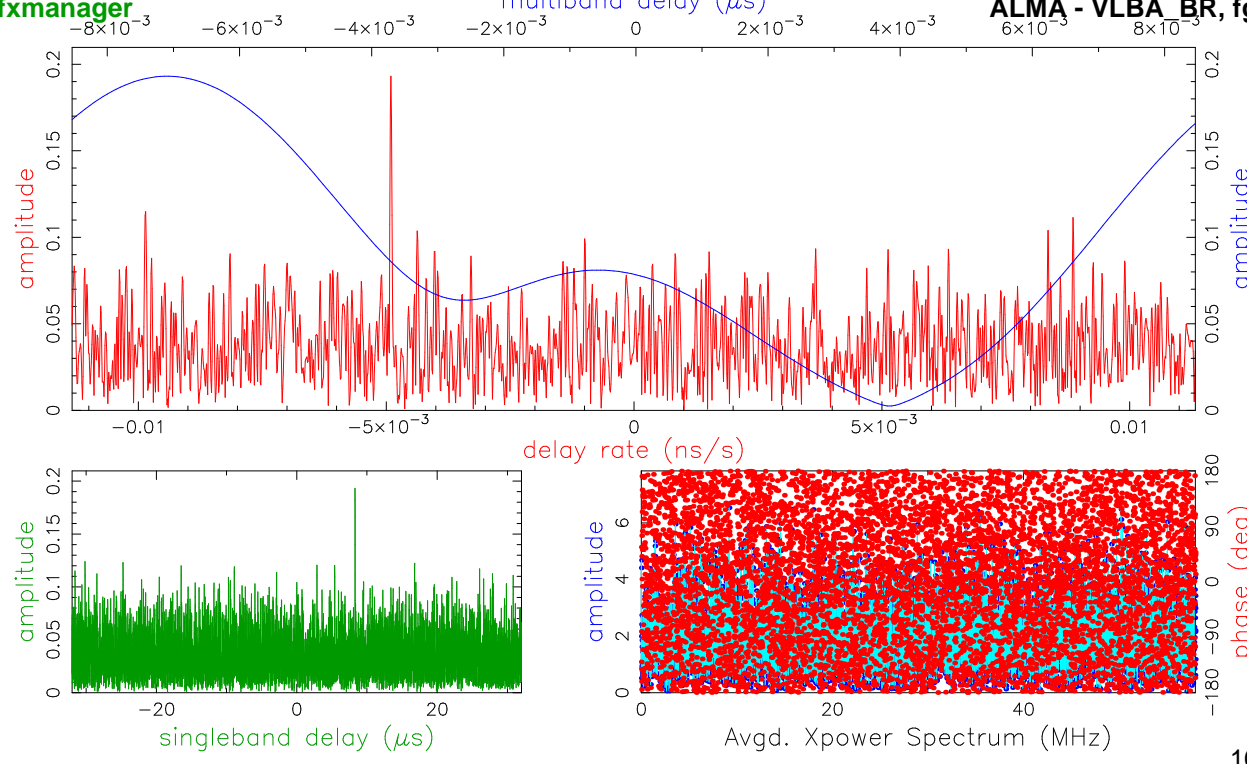
Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

1055+018.1RFZRA, No0017, Ab

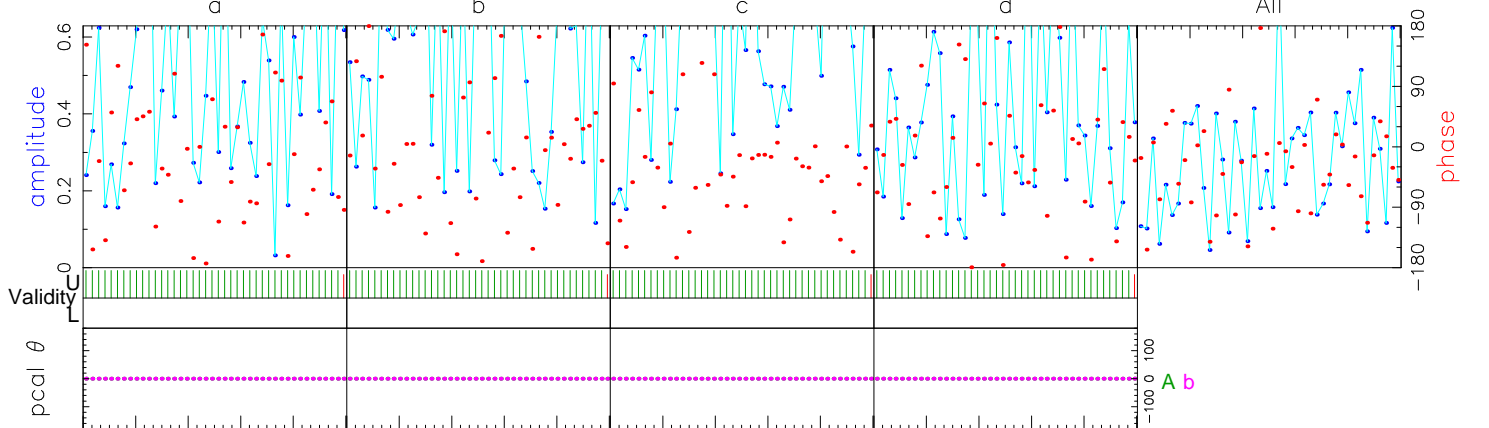
ALMA - VLBA\_BR, fgroup W, pol YR

multiband delay ( $\mu$ s)



Fringe quality 0  
 SNR 6.2  
 Int time 299.974  
 Amp 0.210  
 Phase -150.0  
 PFD 9.1e-01  
 Delays (us)  
 SBD 8.300826  
 MBD -0.007082  
 Fringe rate (Hz)  
 -0.422800  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065452  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	-13.8	-38.1	-43.7	-1.6	Phase	-29.4
	0.2	0.2	0.4	0.1	Ampl.	0.2
	1226.4	8273.0	9350.9	428.8	Sbd box	9350.8
U/L	586/0	586/0	586/0	586/0	APs used	
A	0	0	0	0	PC freqs	
b	1000	1000	1000	1000	PC freqs	
A:b	0:0	0:0	0:0	0:0	PC phase	
A:b	0:0	0:0	0:0	0:0	ManI PC	
A	1000	1000	1000	1000	PC amp	
b	1000	1000	1000	1000		
A	W00UY	W01UY	W02UY	W03UY	Chan ids	
b	W01UR	W02UR	W03UR	W04UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	6.68049156689E+03		Apriori delay (usec)	6.67218718250E+03	Resid mbdelay (usec)	-7.08227E-03 +/- 3.9E-04
Sband delay (usec)	6.68048800843E+03		Apriori clock (usec)	-2.1046143E+03	Resid sbdelay (usec)	8.30083E+00 +/- 1.5E-03
Phase delay (usec)	6.67218718155E+03		Apriori clockrate (us/s)	-1.1300001E-06	Resid phdelay (usec)	-9.47261E-07 +/- 6.0E-07
Delay rate (us/s)	-9.06469977606E-01		Apriori rate (us/s)	-9.06465069321E-01	Resid rate (us/s)	-4.90829E-06 +/- 3.5E-09
Total phase (deg)		-186.0	Apriori accel (us/s/s)	-4.99109509070E-05	Resid phase (deg)	-150.0 +/- 18.5

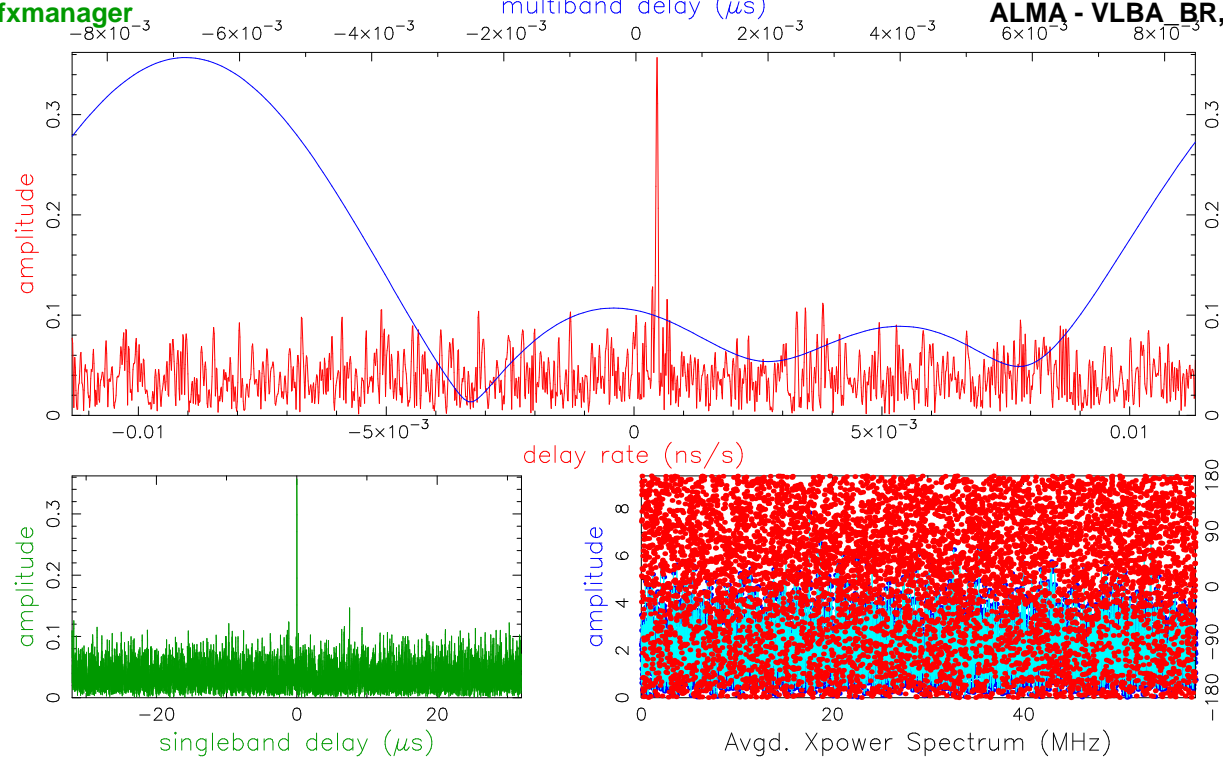
ph/seg (deg) 62.5 60.1 Amplitude 0.210 +/- 0.034 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 93.9 104.8 Search (2048X16) 0.188 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -32.000 32.000  
 ph/frq (deg) 25.5 18.5 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009  
 amp/frq (%) 39.4 32.3 Inc. seg. avg. 0.197 Sample rate(MISamp/s): 116 dr window (ns/s) -0.011 0.011  
 Data rate(Mb/s): 928 nlags: 7424 t\_cohere infinite ion window (TEC) 0.00 0.00  
 A: az 345.5 el 64.8 pa 166.7 b: az 125.0 el 28.9 pa -33.7 u,v (fr/asec) 5138.496 -10137.883 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/Ab..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/Ab.W.19.1RFZRA

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

1055+018.1RFZRA, No0017, Ab

ALMA - VLBA\_BR, fgroup W, pol XR

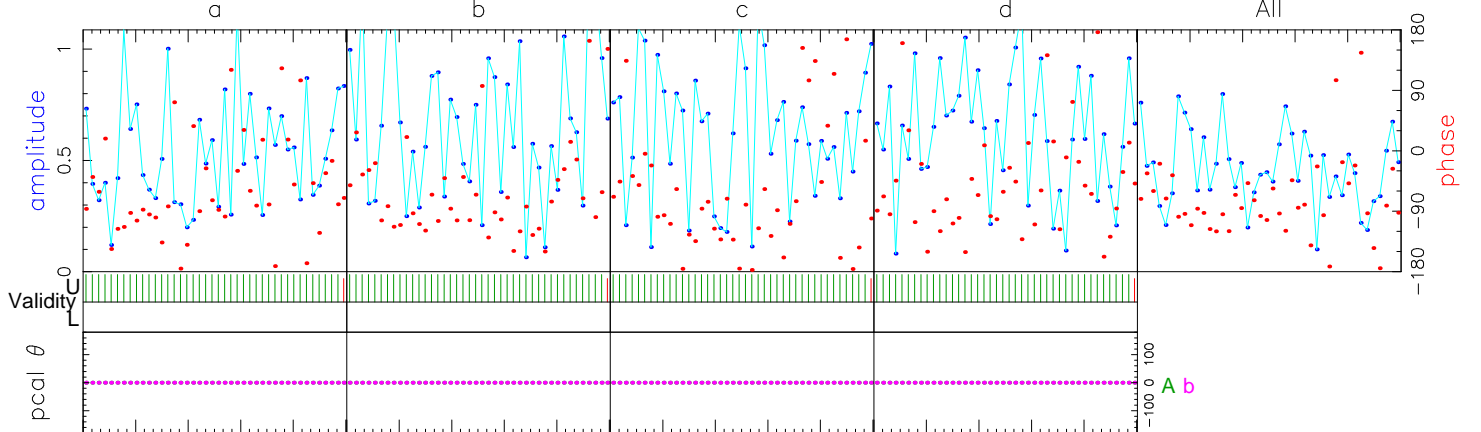


Fringe quality 9

SNR 11.5  
 Int time 299.974  
 Amp 0.362  
 Phase -153.4  
 PFD 6.0e-21  
 Delays (us)  
 SBD 0.011326  
 MBD -0.006763  
 Fringe rate (Hz)  
 0.039815  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512

Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065528  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	-78.5	-84.3	-101.2	-78.0	Phase	-85.1
	0.3	0.4	0.3	0.4	Ampl.	0.4
	7427.2	7427.5	7428.0	7428.0	Sbd box	7427.6
U/L	586/0	586/0	586/0	586/0	APs used	
A	0	0	0	0	PC freqs	
b	1000	1000	1000	1000	PC freqs	
A:b	0:0	0:0	0:0	0:0	PC phase	
A:b	0:0	0:0	0:0	0:0	Manl PC	
A	1000	1000	1000	1000	PC amp	
b	1000	1000	1000	1000		
A	W00UX	W01UX	W02UX	W03UX	Chan ids	
b	W01UR	W02UR	W03UR	W04UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	6.67219748632E+03		Apriori delay (usec)	6.67218718250E+03	Resid mbdelay (usec)	-6.76284E-03 +/- 2.1E-04
Sband delay (usec)	6.67219850857E+03		Apriori clock (usec)	-2.1046143E+03	Resid sbdelay (usec)	1.13261E-02 +/- 8.2E-04
Phase delay (usec)	6.67218717975E+03		Apriori clockrate (us/s)	-1.1300001E-06	Resid phdelay (usec)	-2.74467E-06 +/- 3.2E-07
Delay rate (us/s)	-9.06464607106E-01		Apriori rate (us/s)	-9.06465069321E-01	Resid rate (us/s)	4.62215E-07 +/- 1.8E-09
Total phase (deg)		170.7	Apriori accel (us/s/s)	-4.99109509070E-05	Resid phase (deg)	-153.4 +/- 9.9

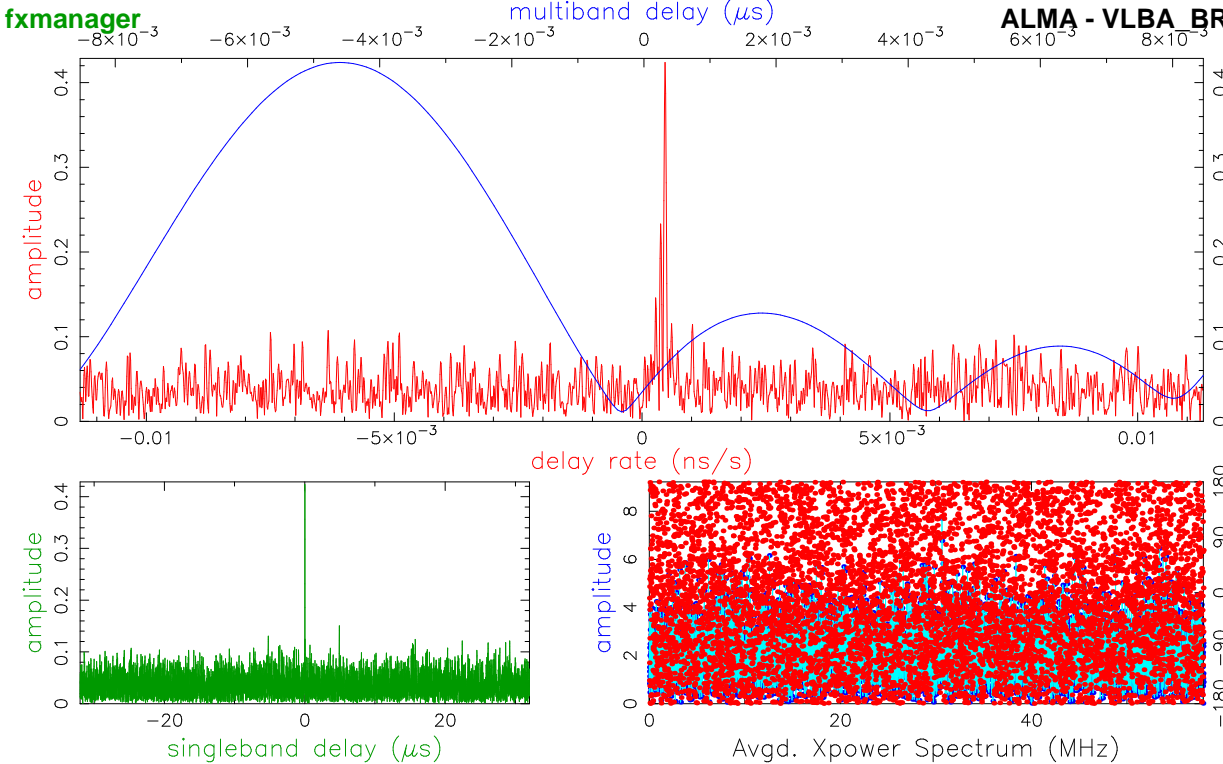
ph/seg (deg) 50.4 32.2 Amplitude 0.362 +/- 0.031 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 54.5 56.2 Search (2048X16) 0.345 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -32.000 32.000  
 ph/frq (deg) 13.3 9.9 Inc. seg. avg. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009  
 amp/frq (%) 15.0 17.3 Inc. frq. avg. 0.402 Sample rate(MSamp/s): 116 Data rate(Mb/s): 928 nlags: 7424 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 A: az 345.5 el 64.8 pa 166.7 b: az 125.0 el 28.9 pa -33.7 u,v (fr/asec) 5138.496 -10137.883 ion window (TEC) 0.00 0.00  
 Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/Ab..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/Ab.W.21.1RFZRA simultaneous interpolator

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

1055+018.1RFZRA, No0017, Ab

ALMA - VLBA BR, fgroup W, pol YL

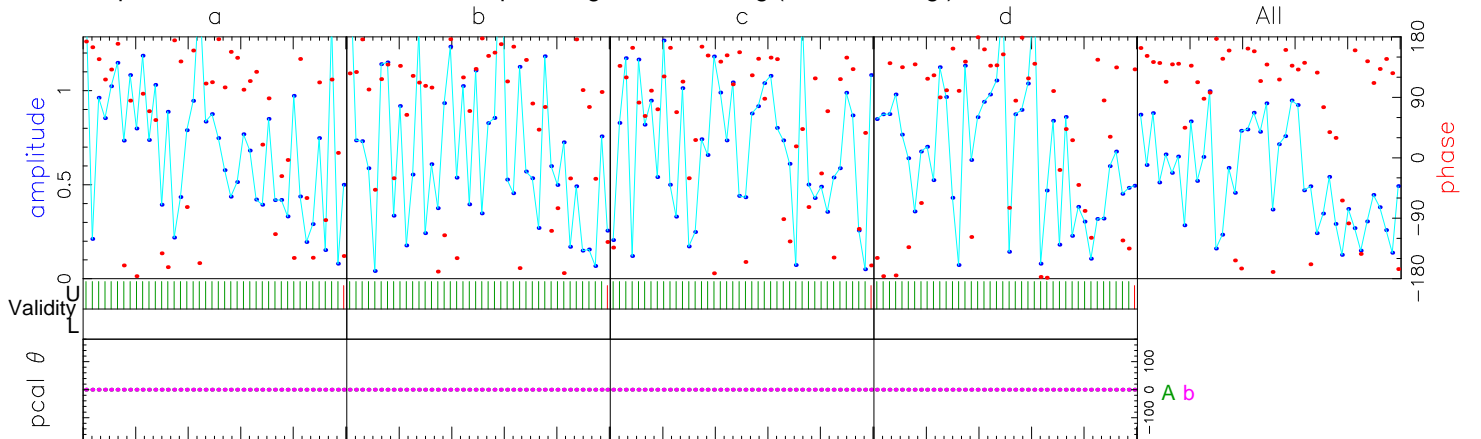


Fringe quality 9

SNR 13.7  
 Int time 299.974  
 Amp 0.429  
 Phase 72.0  
 PFD 1.5e-32  
 Delays (us)  
 SBD 0.014332  
 MBD -0.004573  
 Fringe rate (Hz)  
 0.039722  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512

Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065604  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
142.8	142.5	130.7	145.2	Phase	140.3
0.4	0.5	0.4	0.4	Ampl.	0.4
7427.8	7428.7	7428.3	7428.7	Sbd box	7428.3
U/L 586/0	586/0	586/0	586/0	APs used	
A 0	0	0	0	PC freqs	
b 1000	1000	1000	1000	PC freqs	
A:b 0:0	0:0	0:0	0:0	PC phase	
A:b 0:0	0:0	0:0	0:0	ManI PC	
A 1000	1000	1000	1000	PC amp	
b 1000	1000	1000	1000		
A W00UY	W01UY	W02UY	W03UY	Chan ids	
b W01UL	W02UL	W03UL	W04UL	Tracks	
				Chan ids	
				Tracks	
Group delay (usec)(sbd)	6.67219967625E+03	Apriori delay (usec)	6.67218718250E+03	Resid mbdelay (usec)	-4.57291E-03 +/- 1.8E-04
Sband delay (usec)	6.67220151463E+03	Apriori clock (usec)	-2.1046143E+03	Resid sbdelay (usec)	1.43321E-02 +/- 7.0E-04
Phase delay (usec)	6.67218718702E+03	Apriori clockrate (us/s)	-1.1300001E-06	Resid phdelay (usec)	4.52415E-06 +/- 2.7E-07
Delay rate (us/s)	-9.06464608190E-01	Apriori rate (us/s)	-9.06465069321E-01	Resid rate (us/s)	4.61131E-07 +/- 1.6E-09
Total phase (deg)	36.1	Apriori accel (us/s/s)	-4.99109509070E-05	Resid phase (deg)	72.0 +/- 8.4

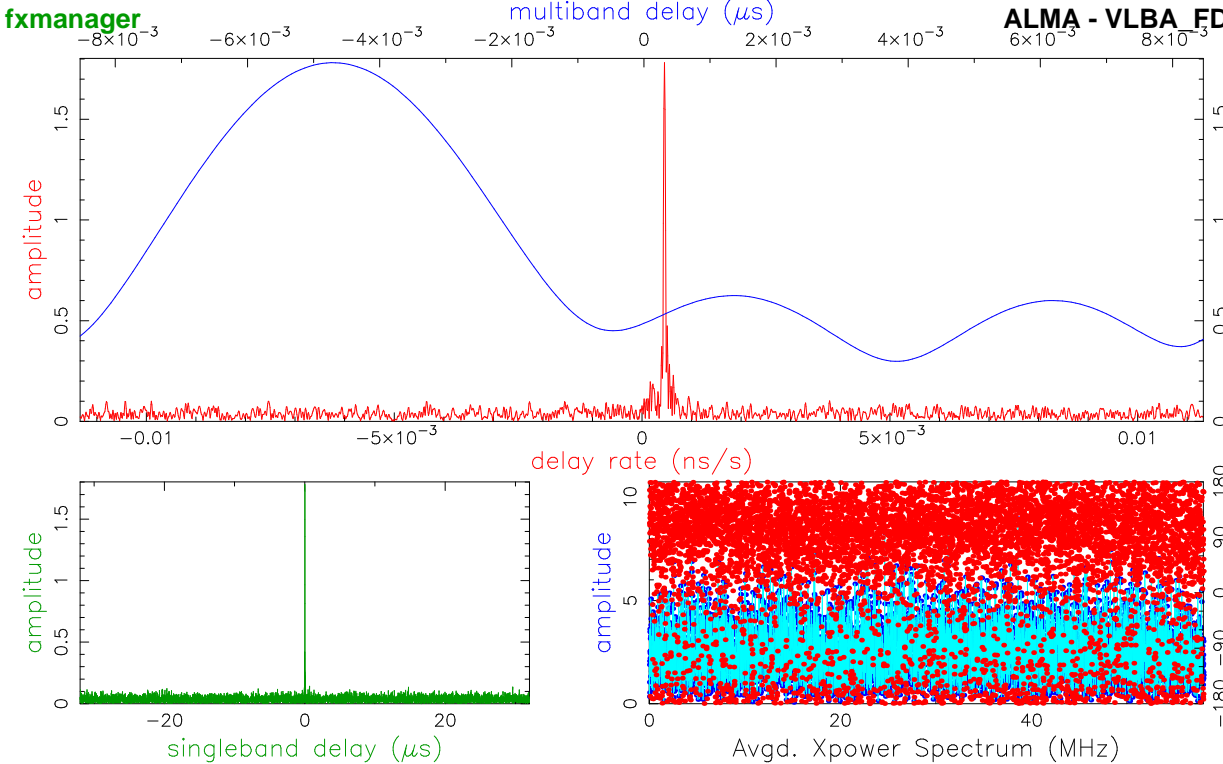
ph/seg (deg) 51.4 27.2 Amplitude 0.429 +/- 0.031 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 64.8 47.5 Search (2048X16) 0.414 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -32.000 32.000  
 ph/frq (deg) 7.9 8.4 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009  
 amp/frq (%) 4.5 14.6 Inc. seg. avg. 0.486 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011  
 A: az 345.5 el 64.8 pa 166.7 b: az 125.0 el 28.9 pa -33.7 u,v (fr/asec) 5138.496 -10137.883 Data rate(Mb/s): 928 nlags: 7424 t\_cohere infinite ion window (TEC) 0.00 0.00  
 Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/Ab..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/Ab.W.23.1RFZRA simultaneous interpolator

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

1055+018.1RFZRA, No0017, Af

ALMA - VLBA FD, fgroup W, pol XL

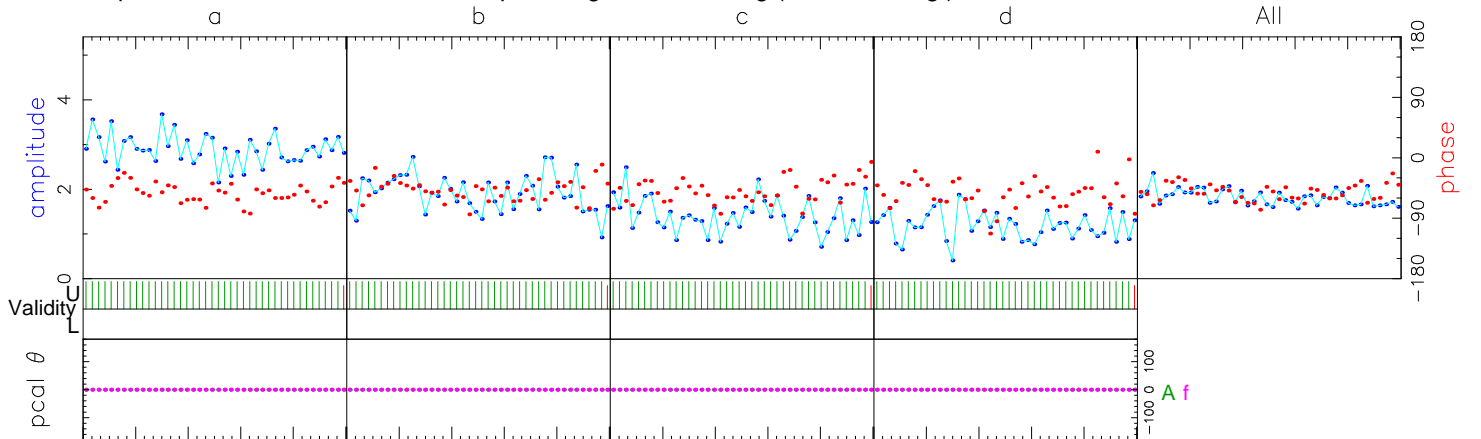


Fringe quality 8

SNR 57.4  
 Int time 299.976  
 Amp 1.803  
 Phase -119.9  
 PFD 0.0e+00  
 Delays (us)  
 SBD 0.014392  
 MBD -0.004698  
 Fringe rate (Hz) 0.038735  
 Ion TEC 0.000  
 Ref freq (MHz) 86140.0000  
 AP (sec) 0.512

Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065416  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	-52.7	-49.2	-50.5	-54.6	Phase	-51.7
	2.8	1.9	1.3	1.1	Ampl.	1.8
	7428.4	7428.4	7428.1	7428.3	Sbd box	7428.3
U/L	586/0	586/0	586/0	586/0	APs used	
A	0	0	0	0	PC freqs	
f	1000	1000	1000	1000	PC freqs	
A:f	0:0	0:0	0:0	0:0	PC phase	
A:f	0:0	0:0	0:0	0:0	Manl PC	
A	1000	1000	1000	1000	PC amp	
f	1000	1000	1000	1000		
A	W00UX	W01UX	W02UX	W03UX	Chan ids	
f	W01UL	W02UL	W03UL	W04UL	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	8.60251378680E+02	Apriori delay (usec)	8.60239009533E+02	Resid mbdelay (usec)	-4.69752E-03	+/- 4.2E-05
Sband delay (usec)	8.60253401533E+02	Apriori clock (usec)	-2.1178665E+03	Resid sbdelay (usec)	1.43920E-02	+/- 1.7E-04
Phase delay (usec)	8.60239007866E+02	Apriori clockrate (us/s)	-1.3800001E-06	Resid phdelay (usec)	-1.66688E-06	+/- 6.4E-08
Delay rate (us/s)	-8.25681142757E-01	Apriori rate (us/s)	-8.25681592431E-01	Resid rate (us/s)	4.49674E-07	+/- 3.7E-10
Total phase (deg)		Apriori accel (us/s/s)	-1.84046897236E-05	Resid phase (deg)	-119.9	+/- 2.0

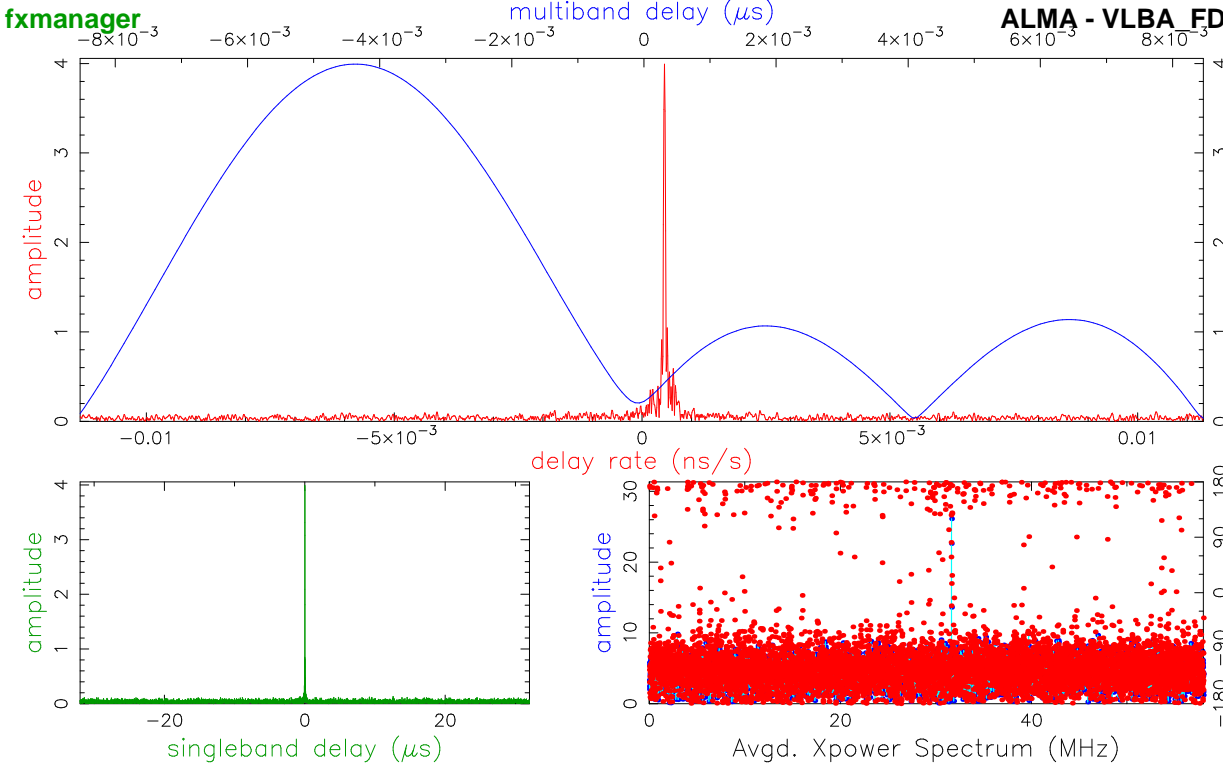
ph/seg (deg) 12.4 6.5 Search (2048X16) 1.704 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 9.7 11.3 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -32.000 32.000  
 ph/frq (deg) 2.9 2.0 Inc. seg. avg. 1.814 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009  
 amp/frq (%) 36.2 3.5 Inc. frq. avg. 1.782 Sample rate(MISamp/s): 116 Data rate (Mb/s): 928 nlags: 7424 t\_cohere infinite dr window (ns/s) -0.011 0.011  
 A: az 345.5 el 64.8 pa 166.7 f: az 129.9 el 49.2 pa -41.0 u,v (fr/asec) 4712.322 -7993.240 ion window (TEC) 0.00 0.00  
 Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/Af..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/Af.W.11.1RFZRA simultaneous interpolator

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

1055+018.1RFZRA, No0017, Af

ALMA - VLBA\_FD, fgroup W, pol YR

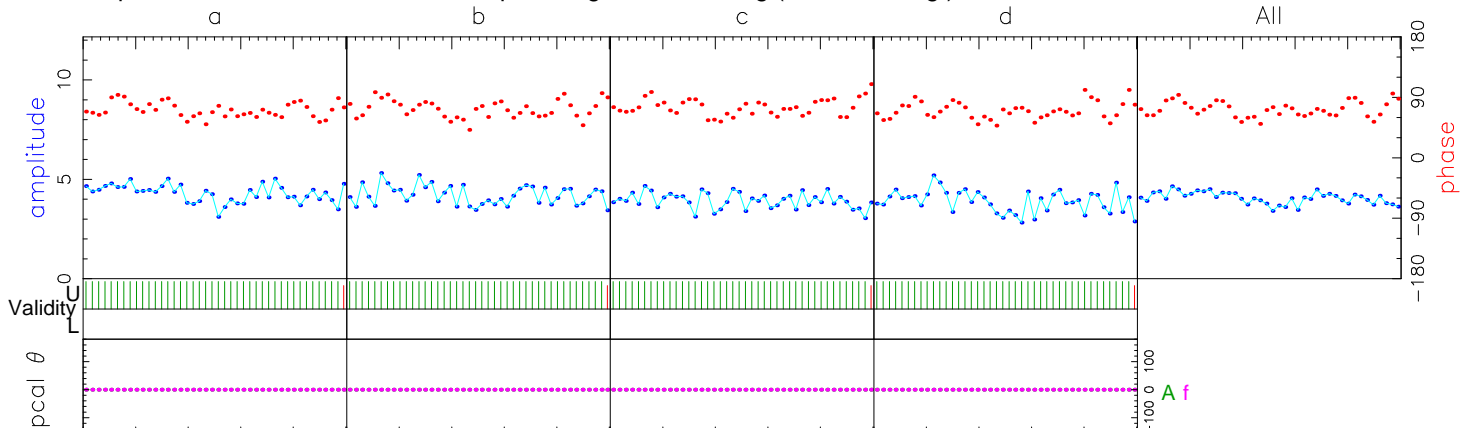


Fringe quality 9

SNR 129.3  
 Int time 299.976  
 Amp 4.057  
 Phase 4.1  
 PFD 0.0e+00  
 Delays (us)  
 SBD 0.014607  
 MBD -0.004364  
 Fringe rate (Hz) 0.038810  
 Ion TEC 0.000  
 Ref freq (MHz) 86140.0000  
 AP (sec) 0.512

Exp. c211d  
 Yr:day # 16383  
 Start 2021:117  
 Stop 2021:117  
 FRT 013730.00  
 Corr/FF/build 2021:195:001812  
 2021:195:065453  
 2021:057:122453  
 RA & Dec (J2000) 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	71.2	73.0	75.2	70.0	Phase	72.4
	4.2	4.1	3.9	3.8	Ampl.	4.0
	7428.4	7428.4	7428.5	7428.3	Sbd box	7428.4
U/L	586/0	586/0	586/0	586/0	APs used	
A	0	0	0	0	PC freqs	
f	1000	1000	1000	1000	PC freqs	
A:f	0:0	0:0	0:0	0:0	PC phase	
A:f	0:0	0:0	0:0	0:0	Manl PC	
A	1000	1000	1000	1000	PC amp	
f	1000	1000	1000	1000		
A	W00UY	W01UY	W02UY	W03UY	Chan ids	
f	W01UR	W02UR	W03UR	W04UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	8.60251712641E+02		Apriori delay (usec)	8.60239009533E+02	Resid mbdelay (usec)	-4.36356E-03 +/- 1.9E-05
Sband delay (usec)	8.60253616981E+02		Apriori clock (usec)	-2.1178665E+03	Resid sbdelay (usec)	1.46074E-02 +/- 7.4E-05
Phase delay (usec)	8.60239011866E+02		Apriori clockrate (us/s)	-1.3800001E-06	Resid phdelay (usec)	2.33324E-06 +/- 2.9E-08
Delay rate (us/s)	-8.25681141891E-01		Apriori rate (us/s)	-8.25681592431E-01	Resid rate (us/s)	4.50540E-07 +/- 1.7E-10
Total phase (deg)		105.3	Apriori accel (us/s/s)	-1.84046897236E-05	Resid phase (deg)	4.1 +/- 0.9
	RMS	Theor.	Amplitude	4.057 +/- 0.031	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5
ph/seg (deg)	11.2	2.9	Search (2048X16)	3.915	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us) -32.000 32.000
amp/seg (%)	7.3	5.0	Interp.	0.000	Bits/sample: 2x2	mb window (us) -0.009 0.009
ph/frq (deg)	2.8	0.9	Inc. seg. avg.	4.068	Sample rate(MISamp/s): 116	dr window (ns/s) -0.011 0.011
amp/frq (%)	4.5	1.5	Inc. frq. avg.	3.998	Data rate(Mb/s): 928	ion window (TEC) 0.00 0.00
nlags: 7424 t_cohere infinite						
simultaneous interpolator						
A: az 345.5 el 64.8 pa 166.7 f: az 129.9 el 49.2 pa -41.0 u,v (fr/asec) 4712.322 -7993.240						
Control file: cf_1234_gmva Input file: /Exps/c211d/v1/1234/No0017/Af..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/Af.W.20.1RFZRA						

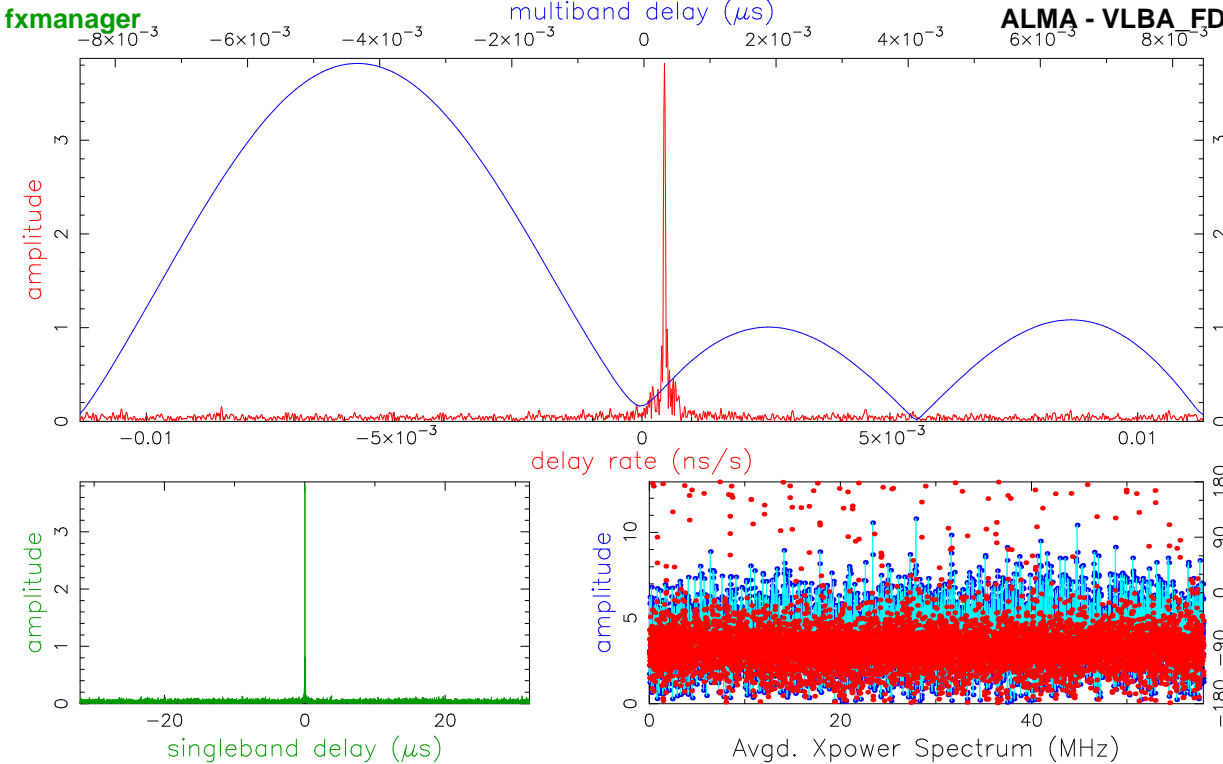


Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

1055+018.1RFZRA, No0017, Af

ALMA - VLBA\_FD, fgroup W, pol XR

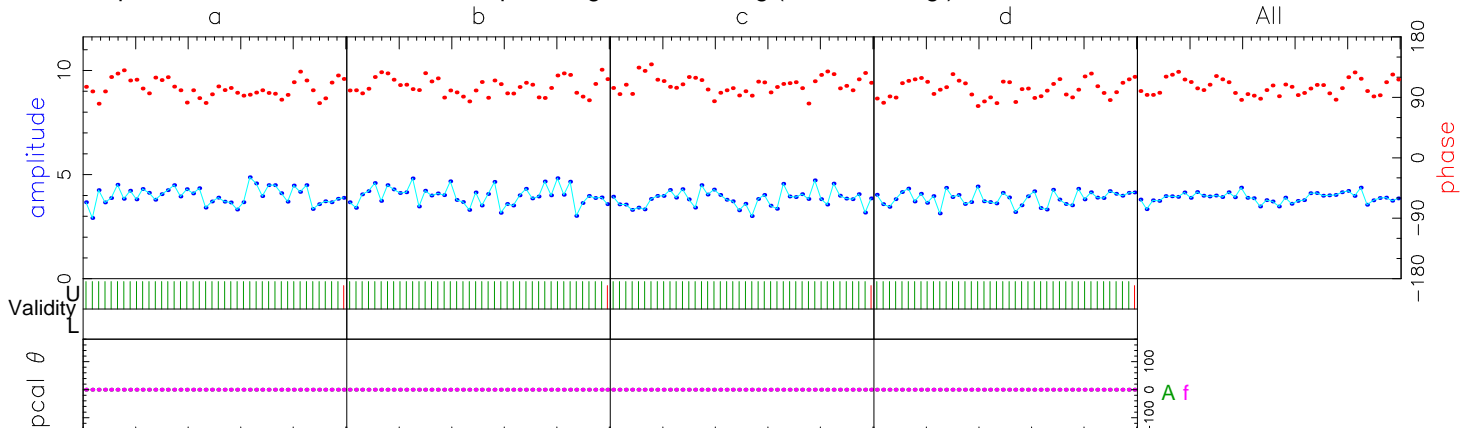


Fringe quality 8

SNR 123.4  
 Int time 299.976  
 Amp 3.873  
 Phase 37.1  
 PFD 0.0e+00  
 Delays (us)  
 SBD 0.014497  
 MBD -0.004335  
 Fringe rate (Hz) 0.038814  
 Ion TEC 0.000  
 Ref freq (MHz) 86140.0000  
 AP (sec) 0.512

Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065530  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	103.4	106.5	109.1	102.4	Phase	105.3
	3.9	3.9	3.8	3.8	Ampl.	3.8
	7428.4	7428.4	7428.4	7428.3	Sbd box	7428.4
U/L	586/0	586/0	586/0	586/0	APs used	
A	0	0	0	0	PC freqs	
f	1000	1000	1000	1000	PC freqs	
A:f	0:0	0:0	0:0	0:0	PC phase	
A:f	0:0	0:0	0:0	0:0	Manl PC	
A	1000	1000	1000	1000	PC amp	
f	1000	1000	1000	1000		
A	W00UX	W01UX	W02UX	W03UX	Chan ids	
f	W01UR	W02UR	W03UR	W04UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	8.60251741586E+02	Apriori delay (usec)	8.60239009533E+02	Resid mbdelay (usec)	-4.33461E-03	+/- 2.0E-05
Sband delay (usec)	8.60253506912E+02	Apriori clock (usec)	-2.1178665E+03	Resid sbdelay (usec)	1.44974E-02	+/- 7.7E-05
Phase delay (usec)	8.60239012929E+02	Apriori clockrate (us/s)	-1.3800001E-06	Resid phdelay (usec)	3.39654E-06	+/- 3.0E-08
Delay rate (us/s)	-8.25681141838E-01	Apriori rate (us/s)	-8.25681592431E-01	Resid rate (us/s)	4.50592E-07	+/- 1.7E-10
Total phase (deg)	138.3	Apriori accel (us/s/s)	-1.84046897236E-05	Resid phase (deg)	37.1	+/- 0.9

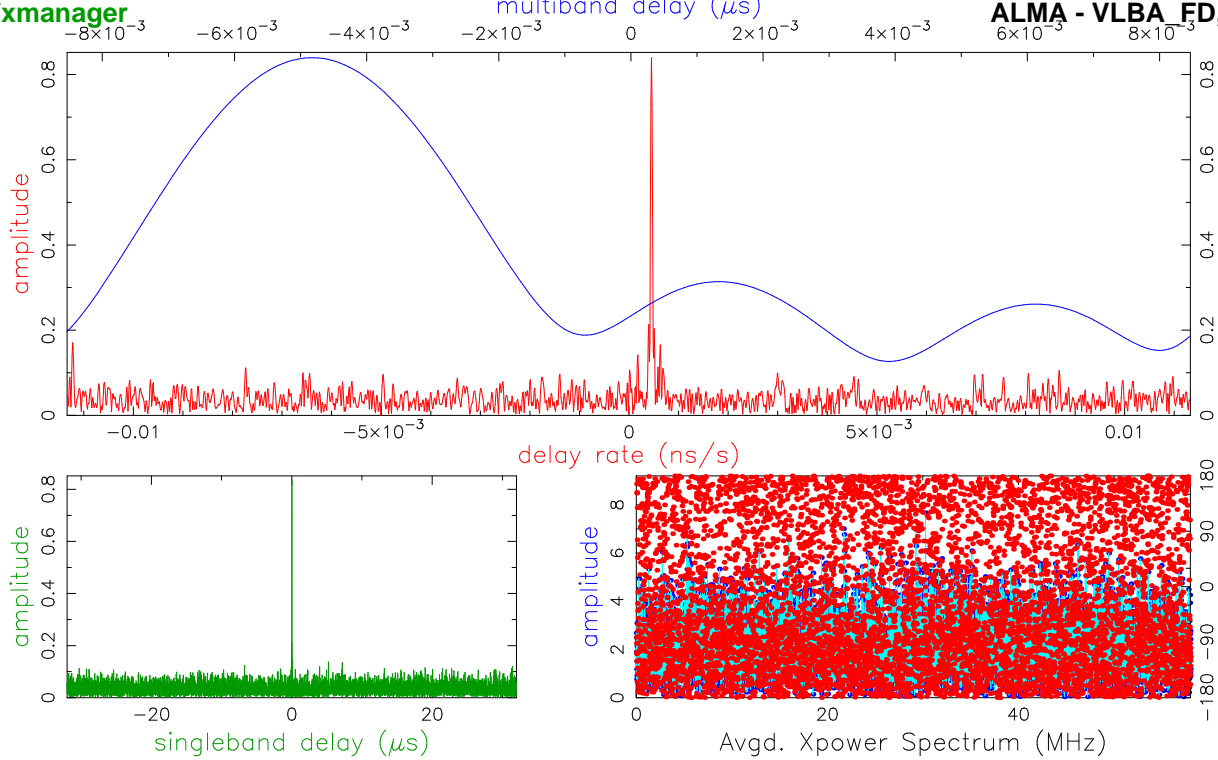
ph/seg (deg) 11.8 3.0 Amplitude 3.873 +/- 0.031 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5  
 amp/seg (%) 5.8 5.3 Search (2048X16) 3.750 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -32.000 32.000  
 ph/frq (deg) 3.7 0.9 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009  
 amp/frq (%) 2.1 1.6 Inc. seg. avg. 3.898 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011  
 A: az 345.5 el 64.8 pa 166.7 f: az 129.9 el 49.2 pa -41.0 u,v (fr/asec) 4712.322 -7993.240 Data rate(Mb/s): 928 nlags: 7424 t\_cohere infinite ion window (TEC) 0.00 0.00  
 Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/Af..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/Af.W.22.1RFZRA simultaneous interpolator

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

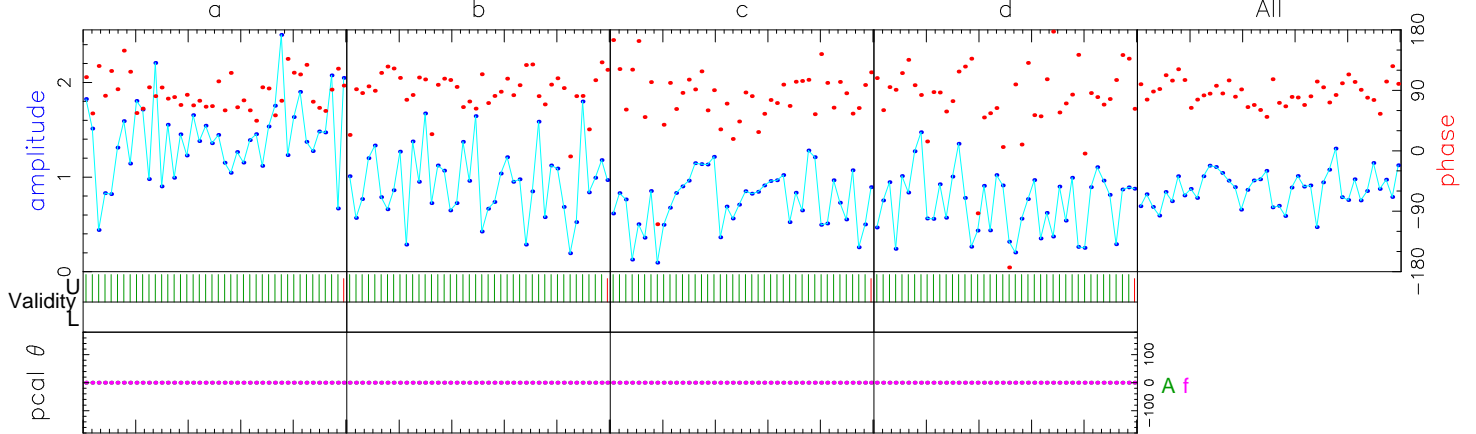
1055+018.1RFZRA, No0017, Af

ALMA - VLBA FD, fgroup W, pol YL



Fringe quality 8  
 SNR 27.1  
 Int time 299.976  
 Amp 0.852  
 Phase 18.1  
 PFD 0.0e+00  
 Delays (us)  
 SBD 0.014537  
 MBD -0.004823  
 Fringe rate (Hz)  
 0.038695  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065605  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 42 segs, 14 APs / seg (7.17 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	586/0	586/0	586/0	586/0		
A	0	0	0	0		
f	1000	1000	1000	1000		
A:f	0:0	0:0	0:0	0:0		
A:f	0:0	0:0	0:0	0:0		
A	1000	1000	1000	1000		
f	1000	1000	1000	1000		
A	W00UY	W01UY	W02UY	W03UY		
f	W01UL	W02UL	W03UL	W04UL		

Group delay (usec)(sbd)	8.60251253343E+02	Apriori delay (usec)	8.60239009533E+02	Resid mbdelay (usec)	-4.82286E-03	+/-	8.9E-05
Sband delay (usec)	8.60253546636E+02	Apriori clock (usec)	-2.1178665E+03	Resid sbdelay (usec)	1.45371E-02	+/-	3.5E-04
Phase delay (usec)	8.60239012318E+02	Apriori clockrate (us/s)	-1.3800001E-06	Resid phdelay (usec)	2.78509E-06	+/-	1.4E-07
Delay rate (us/s)	-8.25681143226E-01	Apriori rate (us/s)	-8.25681592431E-01	Resid rate (us/s)	4.49205E-07	+/-	7.9E-10
Total phase (deg)	119.3	Apriori accel (us/s/s)	-1.84046897236E-05	Resid phase (deg)	18.1	+/-	4.2

ph/seg (deg)	17.7	Theor.	13.7	Amplitude	0.852 +/- 0.031	Pcal mode: MANUAL, MANUAL	PC period (AP's)	5, 5
amp/seg (%)	20.4	Search (2048X16)	0.800	Search	0.800	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us)	-32.000 32.000
ph/frq (deg)	4.3	Interp.	0.000	Inc. seg. avg.	0.857	Bits/sample: 2x2	mb window (us)	-0.009 0.009
amp/frq (%)	32.1	Inc. frq. avg.	0.839	Inc. frq. avg.	0.839	Sample rate(MISamp/s): 116	dr window (ns/s)	-0.011 0.011
						Data rate(Mb/s): 928	ion window (TEC)	0.00 0.00

A: az 345.5 el 64.8 pa 166.7 f: az 129.9 el 49.2 pa -41.0 u,v (fr/asec) 4712.322 -7993.240 simultaneous interpolator

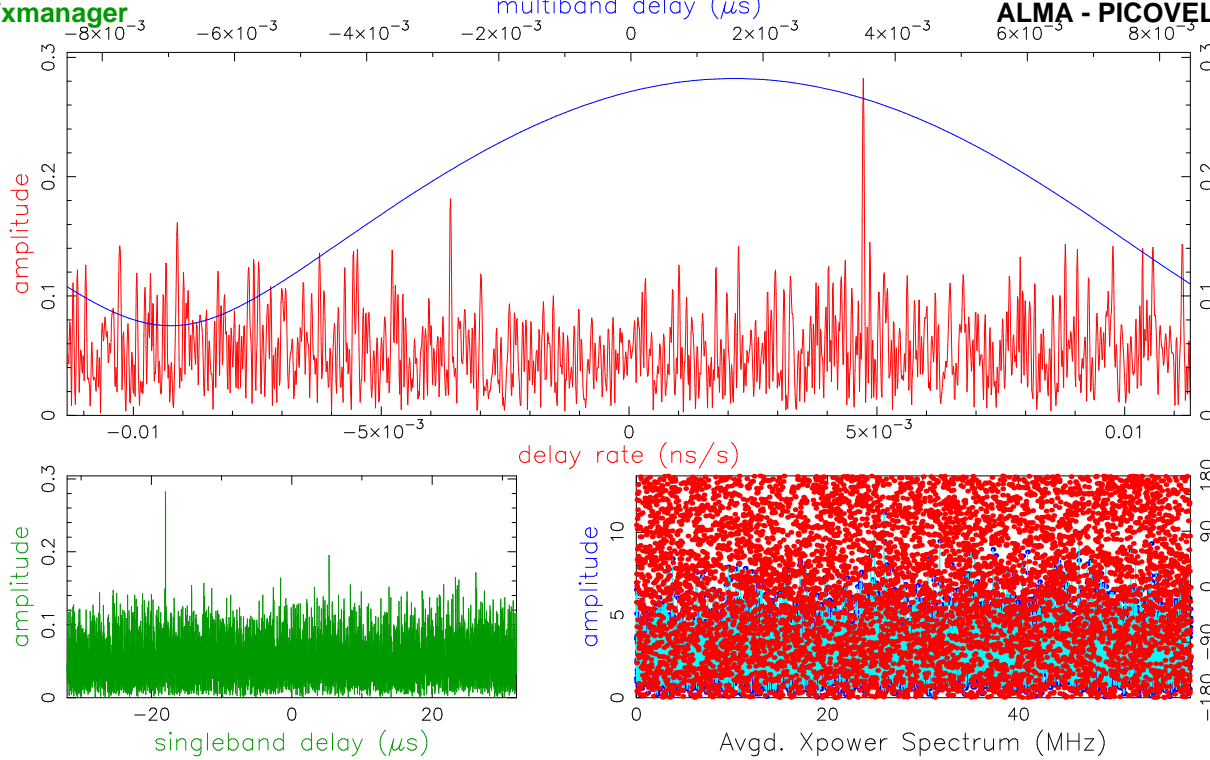
Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/Af..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/Af.W.24.1RFZRA

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

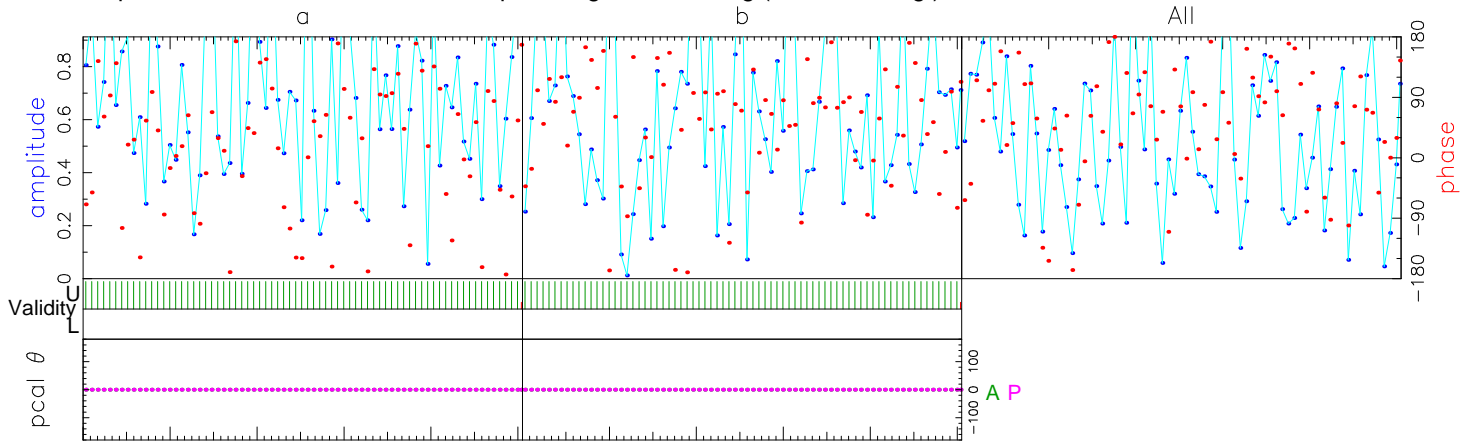
1055+018.1RFZRA, No0017, AP

ALMA - PICOVEL, fgroup W, pol XL



Fringe quality 0  
 SNR 6.4  
 Int time 299.976  
 Amp 0.304  
 Phase 18.6  
 PFD 3.0e-01  
 Delays (us)  
 SBD -17.982109  
 MBD 0.001473  
 Fringe rate (Hz)  
 0.407295  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065354  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 74 segs, 8 APs / seg (4.10 sec / seg.), time ticks 5 sec



86209.70	86268.30	Freq (MHz)	All				
75.5	77.5	Phase	76.8				
0.2	0.4	Ampl.	0.3				
12302.5	3253.6	Sbd box	3253.2				
U/L 586/0	586/0	APs used					
A 0	0	PC freqs					
P 296	296	PC freqs					
A:P 0:0	0:0	PC phase					
A:P 0:0	0:0	Manl PC					
A 1000	1000	PC amp					
P 1000	1000						
A W01UX	W02UX	Chan ids					
P W00UL	W01UL	Tracks					
		Chan ids					
		Tracks					
Group delay (usec)(sbd)	1.13600597877E+04	Apriori delay (usec)	1.13780465810E+04	Resid mbdelay (usec)	1.47344E-03	+/-	8.5E-04
Sband delay (usec)	1.13600644715E+04	Apriori clock (usec)	-2.1065229E+03	Resid sbdelay (usec)	-1.79821E+01	+/-	1.5E-03
Phase delay (usec)	1.13780465834E+04	Apriori clockrate (us/s)	-6.3000007E-07	Resid phdelay (usec)	2.47590E-06	+/-	5.8E-07
Delay rate (us/s)	1.00062557583E+00	Apriori rate (us/s)	1.00062084754E+00	Resid rate (us/s)	4.72829E-06	+/-	3.3E-09
Total phase (deg)	193.0	Apriori accel (us/s/s)	-7.45374110437E-05	Resid phase (deg)	18.6	+/-	18.0

ph/seg (deg)	RMS 75.8	Theor. 77.3	Amplitude Search (2048X8)	0.304 +/- 0.048	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-32.000	32.000
amp/seg (%)	129.8	134.9	Interp.	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	SampCntNorm: enabled	mb window (us)	-0.009	0.009
ph/frq (deg)	0.0	12.7	Inc. seg. avg.	0.294	Bits/sample: 2x2	Sample rate(MISamp/s): 116	dr window (ns/s)	-0.011	0.011
amp/frq (%)	26.5	22.2	Inc. frq. avg.	0.296	Data rate(Mb/s): 464	nlags: 7424 t_cohere infinite	ion window (TEC)	0.00	0.00

A: az 345.5 el 64.8 pa 166.7 P: az 259.1 el 16.4 pa 51.7 u,v (fr/asec) -5816.593 -8932.888 simultaneous interpolator

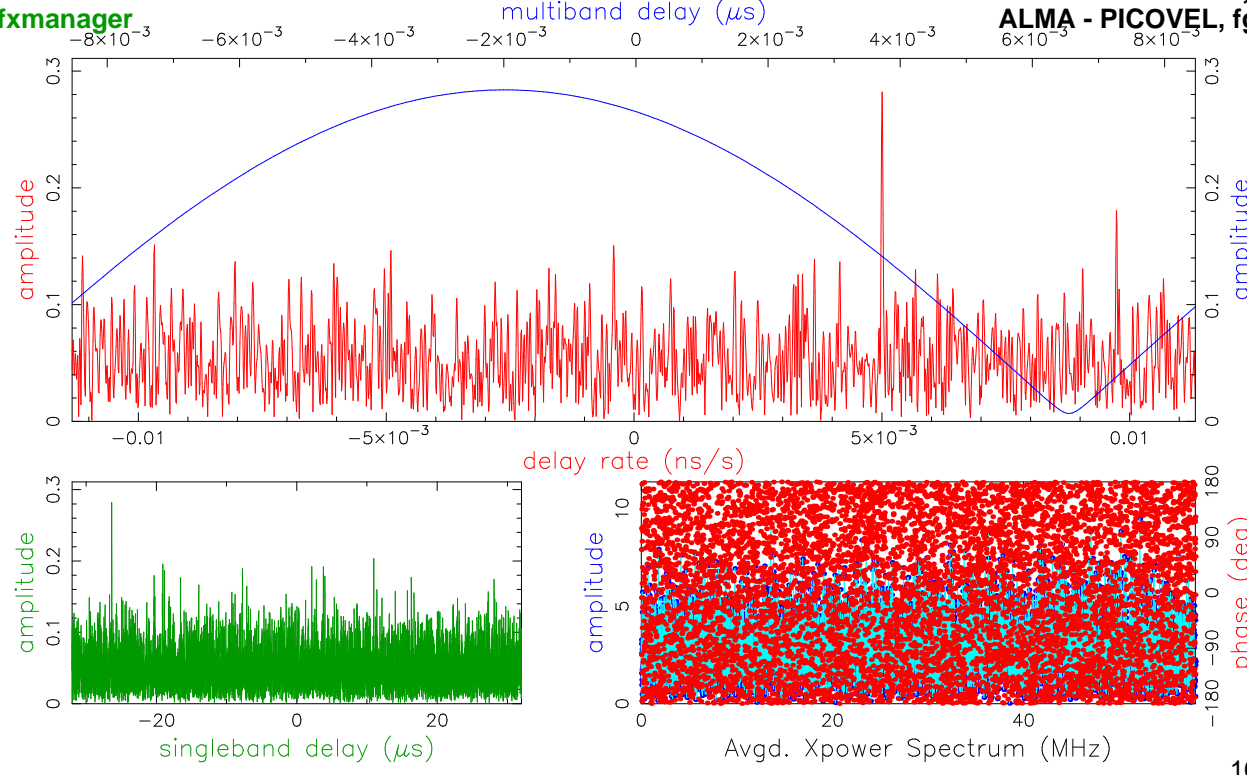
Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/AP..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/AP.W.1.1RFZRA

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fxmanager

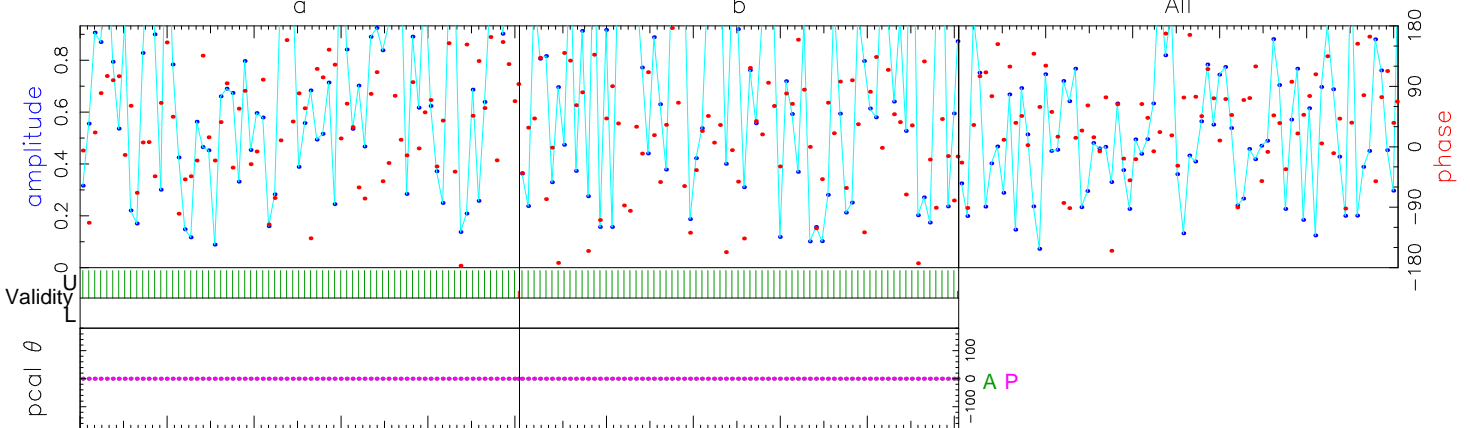
1055+018.1RFZRA, No0017, AP

ALMA - PICOVEL, fgroup W, pol XR



Fringe quality 0  
 SNR 6.5  
 Int time 299.976  
 Amp 0.311  
 Phase 312.7  
 PFD 1.9e-01  
 Delays (us)  
 SBD -26.359552  
 MBD -0.001363  
 Fringe rate (Hz)  
 0.430622  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065430  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 74 segs, 8 APs / seg (4.10 sec / seg.), time ticks 5 sec



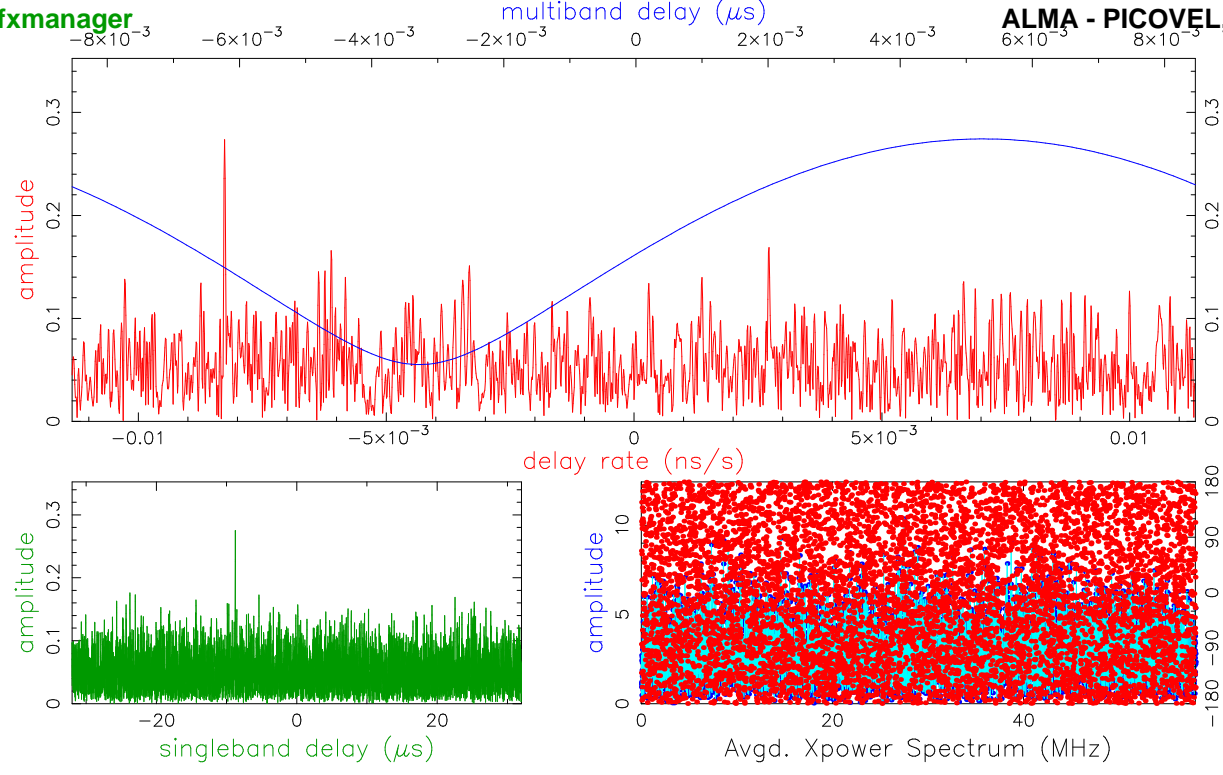
86209.70	86268.30	Freq (MHz)	All					
51.8	38.8	Phase	45.4					
0.3	0.3	Ampl.	0.3					
1309.3	1310.6	Sbd box	1309.6					
U/L 586/0	586/0	APs used						
A 0	0	PC freqs						
P 296	296	PC freqs						
A:P 0:0	0:0	PC phase						
A:P 0:0	0:0	Manl PC						
A 1000	1000	PC amp						
P 1000	1000							
A W01UX	W02UX	Chan ids						
P W00UR	W01UR	Tracks						
		Chan ids						
		Tracks						
Group delay (usec)(sbd)	1.13516942844E+04	Apriori delay (usec)	1.13780465810E+04	Resid mbdelay (usec)	-1.36323E-03	+/-	8.4E-04	
Sband delay (usec)	1.13516870290E+04	Apriori clock (usec)	-2.1065229E+03	Resid sbdelay (usec)	-2.63596E+01	+/-	1.5E-03	
Phase delay (usec)	1.13780465824E+04	Apriori clockrate (us/s)	-6.3000007E-07	Resid phdelay (usec)	1.46450E-06	+/-	5.7E-07	
Delay rate (us/s)	1.00062584663E+00	Apriori rate (us/s)	1.00062084754E+00	Resid rate (us/s)	4.99909E-06	+/-	3.3E-09	
Total phase (deg)	127.1	Apriori accel (us/s/s)	-7.45374110437E-05	Resid phase (deg)	312.7	+/-	17.7	
	RMS	Theor.	Amplitude	0.311 +/- 0.048	Pcal mode: MANUAL, MANUAL	PC period (AP's)	5, 5	
ph/seg (deg)	66.7	76.3	Search (2048X8)	0.274	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us)	-32.000 32.000	
amp/seg (%)	119.1	133.1	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	mb window (us)	-0.009 0.009
ph/frq (deg)	0.0	12.5	Inc. seg. avg.	0.297	Sample rate(MISamp/s): 116		dr window (ns/s)	-0.011 0.011
amp/frq (%)	2.5	21.9	Inc. frq. avg.	0.301	Data rate(Mb/s): 464	nlags: 7424 t_cohere infinite	ion window (TEC)	0.00 0.00
A: az 345.5 el 64.8 pa 166.7 P: az 259.1 el 16.4 pa 51.7 u,v (fr/asec) -5816.593 -8932.888 simultaneous interpolator								
Control file: cf_1234_gmva Input file: /Exps/c211d/v1/1234/No0017/AP..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/AP.W.12.1RFZRA								

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

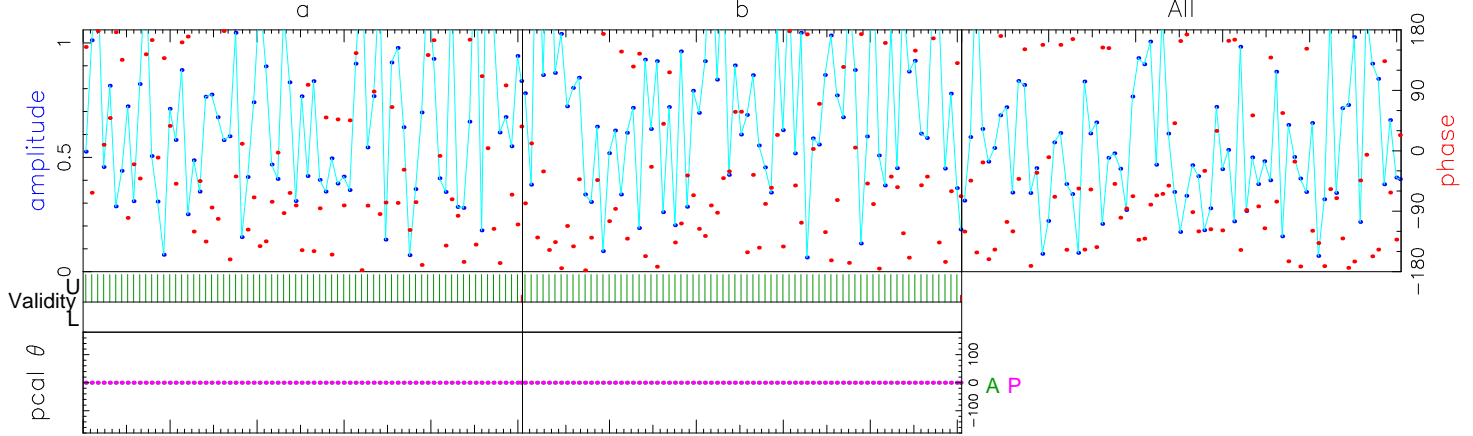
1055+018.1RFZRA, No0017, AP

ALMA - PICOVEL, fgroup W, pol YL



Fringe quality 0  
 SNR 6.3  
 Int time 299.976  
 Amp 0.352  
 Phase 339.0  
 PFD 3.9e-01  
 Delays (us)  
 SBD -8.756326  
 MBD 0.004846  
 Fringe rate (Hz)  
 -0.710612  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065448  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 74 segs, 8 APs / seg (4.10 sec / seg.), time ticks 5 sec



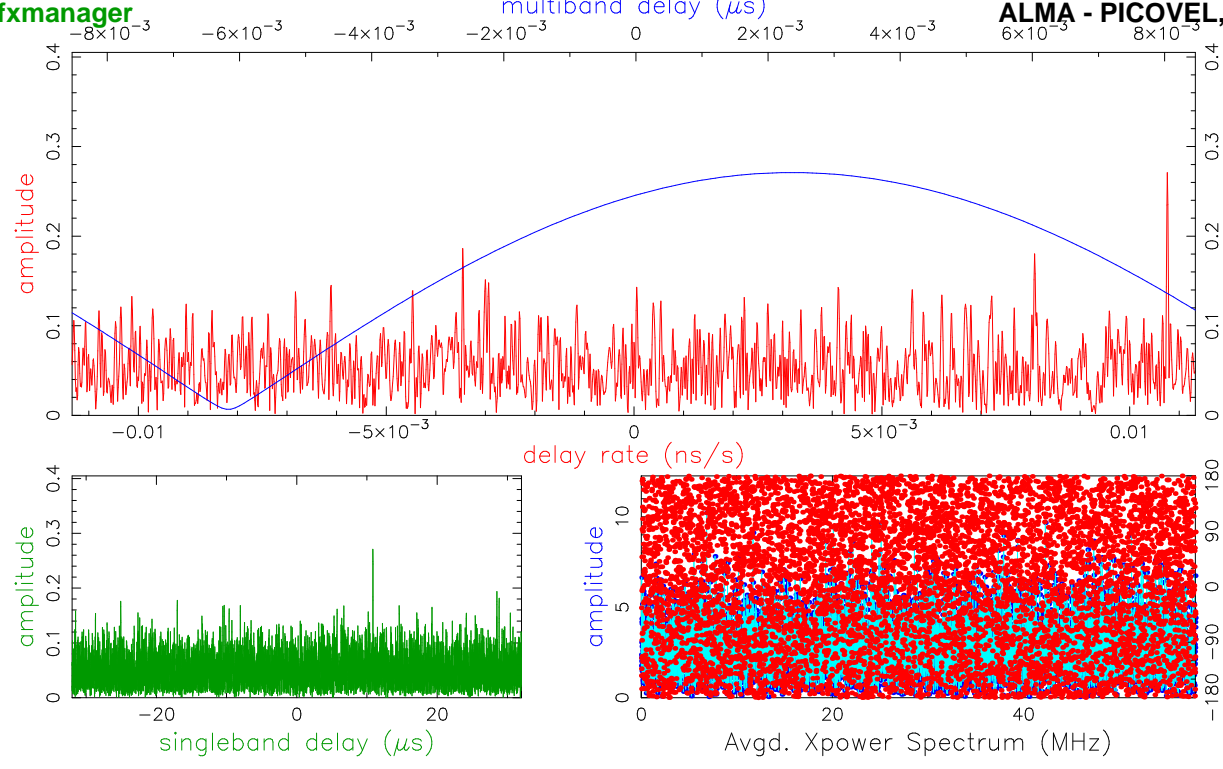
86209.70	86268.30	Freq (MHz)	All					
-121.4	-112.9	Phase	-116.3					
0.3	0.4	Ampl.	0.3					
5179.7	5393.8	Sbd box	5393.5					
U/L 586/0	586/0	APs used						
A 0	0	PC freqs						
P 296	296	PC freqs						
A:P 0:0	0:0	PC phase						
A:P 0:0	0:0	Manl PC						
A 1000	1000	PC amp						
P 1000	1000							
A W01UY	W02UY	Chan ids						
P W00UL	W01UL	Tracks						
		Chan ids						
		Tracks						
Group delay (usec)(sbd)	1.13692962271E+04	Apriori delay (usec)	1.13780465810E+04	Resid mbdelay (usec)	4.84610E-03	+/-	8.6E-04	
Sband delay (usec)	1.13692902555E+04	Apriori clock (usec)	-2.1065229E+03	Resid sbdelay (usec)	-8.75633E+00	+/-	1.5E-03	
Phase delay (usec)	1.13780465772E+04	Apriori clockrate (us/s)	-6.3000007E-07	Resid phdelay (usec)	-3.74975E-06	+/-	5.8E-07	
Delay rate (us/s)	1.00061259804E+00	Apriori rate (us/s)	1.00062084754E+00	Resid rate (us/s)	-8.24950E-06	+/-	3.4E-09	
Total phase (deg)	153.5	Apriori accel (us/s/s)	-7.45374110437E-05	Resid phase (deg)	339.0	+/-	18.1	
RMS	Theor.	Amplitude	0.352 +/- 0.056	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5	
70.1	77.9	Search (2048X8)	0.272	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-32.000 32.000	
137.6	136.0	Interp.	0.000	Bits/sample:	2x2	SampCntNorm: enabled	mb window (us)	-0.009 0.009
0.0	12.8	Inc. seg. avg.	0.356	Sample rate (MSamp/s):	116	dr window (ns/s)	-0.011 0.011	
19.8	22.4	Inc. frq. avg.	0.336	Data rate (Mb/s):	464	ion window (TEC)	0.00 0.00	
A: az 345.5 el 64.8 pa 166.7		P: az 259.1 el 16.4 pa 51.7		u,v (fr/asec)		-5816.593 -8932.888		simultaneous interpolator
Control file: cf_1234_gmva Input file: /Exps/c211d/v1/1234/No0017/AP..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/AP.W.15.1RFZRA								

Mk4/DiFX fourfit 3.21 rev 2937

fxmanager

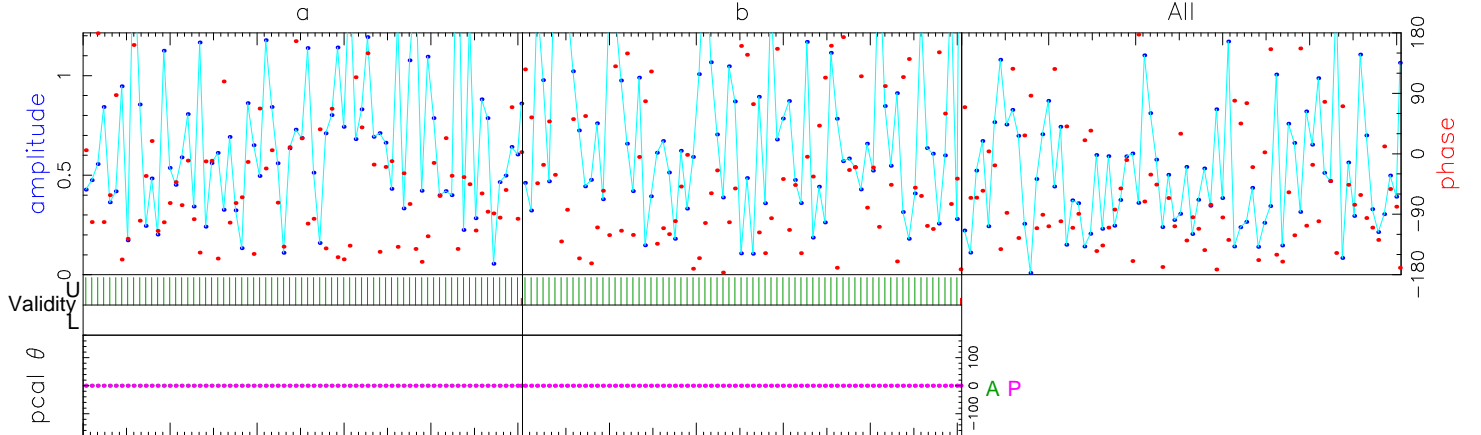
1055+018.1RFZRA, No0017, AP

ALMA - PICOVEL, fgroup W, pol YR



Fringe quality 0  
 SNR 6.1  
 Int time 299.976  
 Amp 0.405  
 Phase -238.9  
 PFD 8.5e-01  
 Delays (us)  
 SBD 10.844604  
 MBD 0.002368  
 Fringe rate (Hz)  
 0.926157  
 Ion TEC 0.000  
 Ref freq (MHz)  
 86140.0000  
 AP (sec) 0.512  
 Exp. c211d  
 Exper # 16383  
 Yr:day 2021:117  
 Start 013500.00  
 Stop 014000.03  
 FRT 013730.00  
 Corr/FF/build  
 2021:195:001812  
 2021:195:065412  
 2021:057:122453  
 RA & Dec (J2000)  
 10h58m29.605207s  
 +01°33'58.823723"

Amp. and Phase vs. time for each freq., 74 segs, 8 APs / seg (4.10 sec / seg.), time ticks 5 sec



86209.70	86268.30	Freq (MHz)	All
-96.3	-96.4	Phase	-96.3
0.4	0.4	Ampl.	0.4
12357.0	9940.8	Sbd box	9940.9
U/L 586/0	586/0	APs used	
A 0	0	PC freqs	
P 296	296	PC freqs	
A:P 0:0	0:0	PC phase	
A:P 0:0	0:0	Manl PC	
A 1000	1000	PC amp	
P 1000	1000		
A W01UY	W02UY	Chan ids	
P W00UR	W01UR	Tracks	

Group delay (usec)(sbd)	1.1388862822E+04	Apriori delay (usec)	1.13780465810E+04	Resid mbdelay (usec)	2.36794E-03	+/-	8.9E-04
Sband delay (usec)	1.13888911846E+04	Apriori clock (usec)	-2.1065229E+03	Resid sbdelay (usec)	1.08446E+01	+/-	1.6E-03
Phase delay (usec)	1.13780465779E+04	Apriori clockrate (us/s)	-6.3000007E-07	Resid phdelay (usec)	-3.10681E-06	+/-	6.0E-07
Delay rate (us/s)	1.00063159930E+00	Apriori rate (us/s)	1.00062084754E+00	Resid rate (us/s)	1.07518E-05	+/-	3.5E-09
Total phase (deg)	-64.5	Apriori accel (us/s/s)	-7.45374110437E-05	Resid phase (deg)	-238.9	+/-	18.8

ph/seg (deg)	80.3	Theor.	80.7	Amplitude	0.405 +/- 0.066	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5	
amp/seg (%)	138.5	Search (2048X8)	0.266	Interp.	0.000	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-32.000 32.000	
ph/frq (deg)	0.0	Inc. seg. avg.	0.377	Inc. frq. avg.	0.394	Bits/sample:	2x2	SampCntNorm: enabled	mb window (us)	-0.009 0.009
amp/frq (%)	2.4	Inc. frq. avg.	0.394			Sample rate (MSamp/s):	116	dr window (ns/s)	-0.011 0.011	
						Data rate (Mb/s):	464	ion window (TEC)	0.00 0.00	

A: az 345.5 el 64.8 pa 166.7 P: az 259.1 el 16.4 pa 51.7 u,v (fr/asec) -5816.593 -8932.888 simultaneous interpolator  
 Control file: cf\_1234\_gmva Input file: /Exps/c211d/v1/1234/No0017/AP..1RFZRA Output file: /Exps/c211d/v1/1234/No0017/AP.W.5.1RFZRA