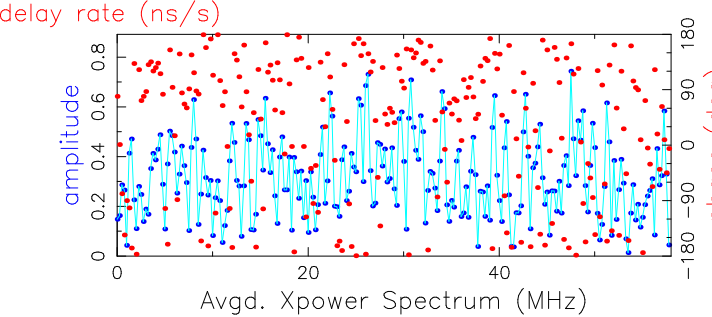
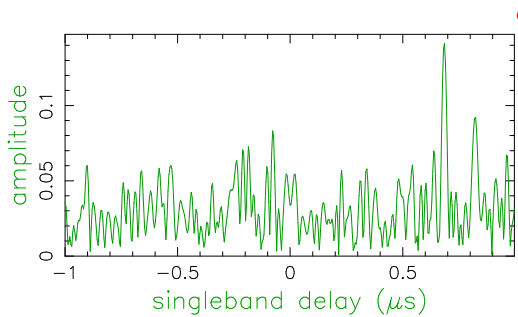
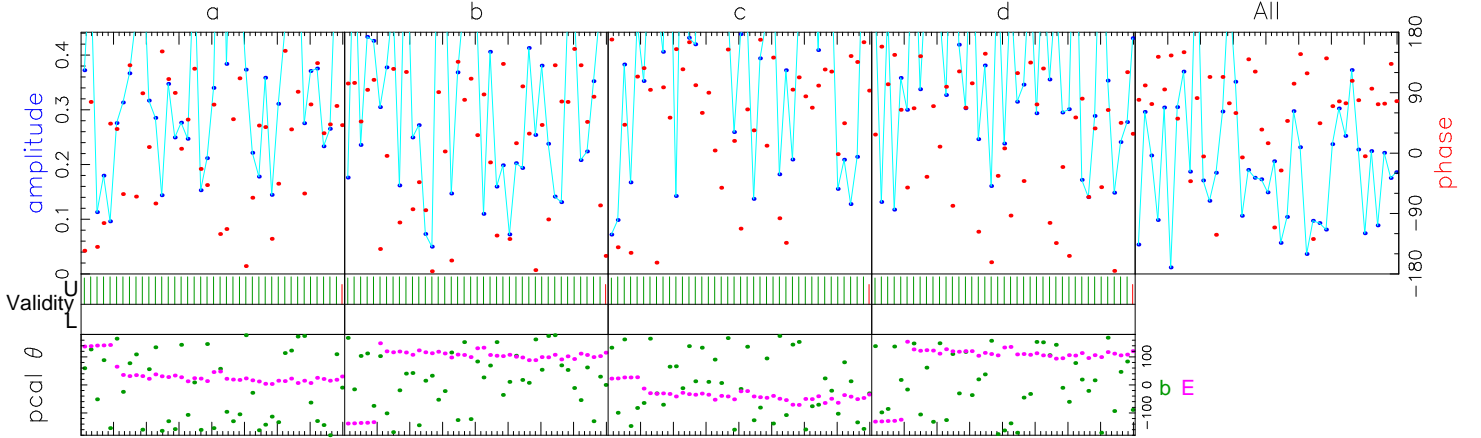


Fringe quality 0
 SNR 5.7
 Int time 478.597
 Amp 0.147
 Phase -2643.2
 PFD 7.1e-01
 Delays (us)
 SBD 0.684158
 MBD -0.001054
 Fringe rate (Hz)
 -0.294824
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512



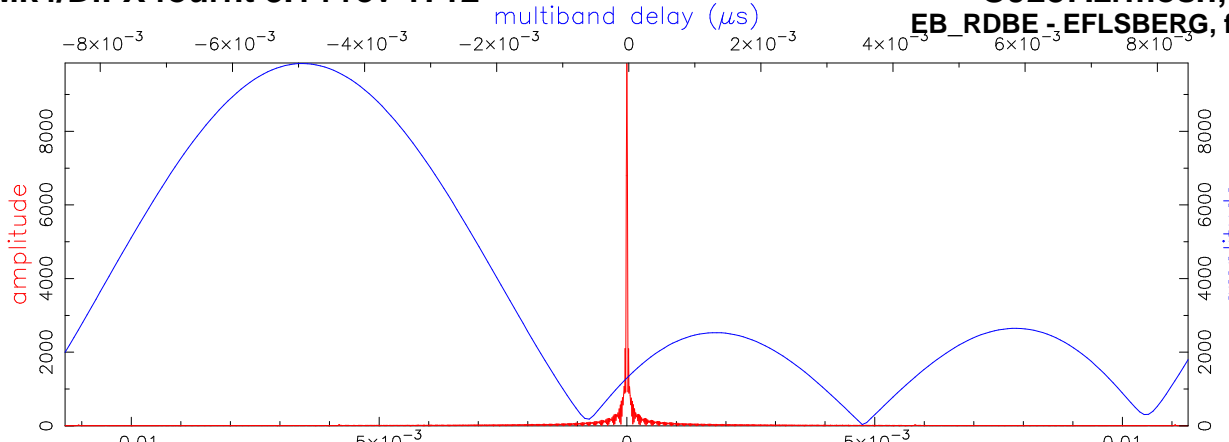
Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:163758
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

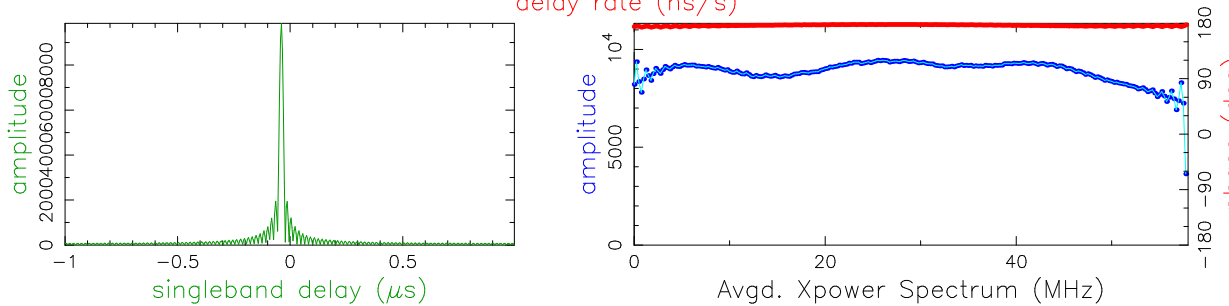


	86151.11	86209.70	86268.30	86326.89	86385.48	All
86151.11	68.9	92.0	103.8	58.5		87.1
UL	937/0	937/0	937/0	937/0		391.7
b	3890	296	1703	3109		
E	3890	296	1703	3109		
b:E	0:0	0:0	0:0	0:0		
b	1000	1000	1000	1000		
E	1000	1000	1000	1000		
b	W00UL	W01UL	W02UL	W03UL		
E	W00UR	W01UR	W02UR	W03UR		
Group delay (usec)(sbd)	5.46820467381E+03	5.46820721983E+03	5.46752306148E+03	5.46752306148E+03	Resid mbdelay (usec)	-1.05434E-03 +/- 4.3E-04
Sband delay (usec)	5.46820721983E+03	5.46752306429E+03	5.46752306429E+03	5.46752306429E+03	Resid sbdelay (usec)	6.84158E-01 +/- 1.7E-03
Phase delay (usec)	5.46752306429E+03	5.46752306429E+03	5.46752306429E+03	5.46752306429E+03	Resid phdelay (usec)	2.80722E-06 +/- 6.5E-07
Delay rate (us/s)	1.64847259461E+00	1.64847259461E+00	1.64847259461E+00	1.64847259461E+00	Resid rate (us/s)	-3.42262E-06 +/- 2.3E-09
Total phase (deg)		-2457.3			Resid phase (deg)	-2643.2 +/- 20.1
					Apriori delay (usec)	0.139
					Apriori clock (usec)	-3.3217640E+01
					Apriori clockrate (us/s)	8.4971669E-09
					Apriori rate (us/s)	1.64847601723E+00
					Apriori accel (us/s/s)	-3.03048891089E-05
					PCal mode:	MANUAL, MANUAL
					PCal rate:	0.000E+00, 0.000E+00 (us/s)
					PCal period (AP's)	5, 5
					sb window (us)	-1.000 1.000
					mb window (us)	-0.009 0.009
					dr window (ns/s)	-0.011 0.011
					ion window (TEC)	0.00 0.00
					lags:	232
					t_cohere	infinite
					simultaneous interpolator	

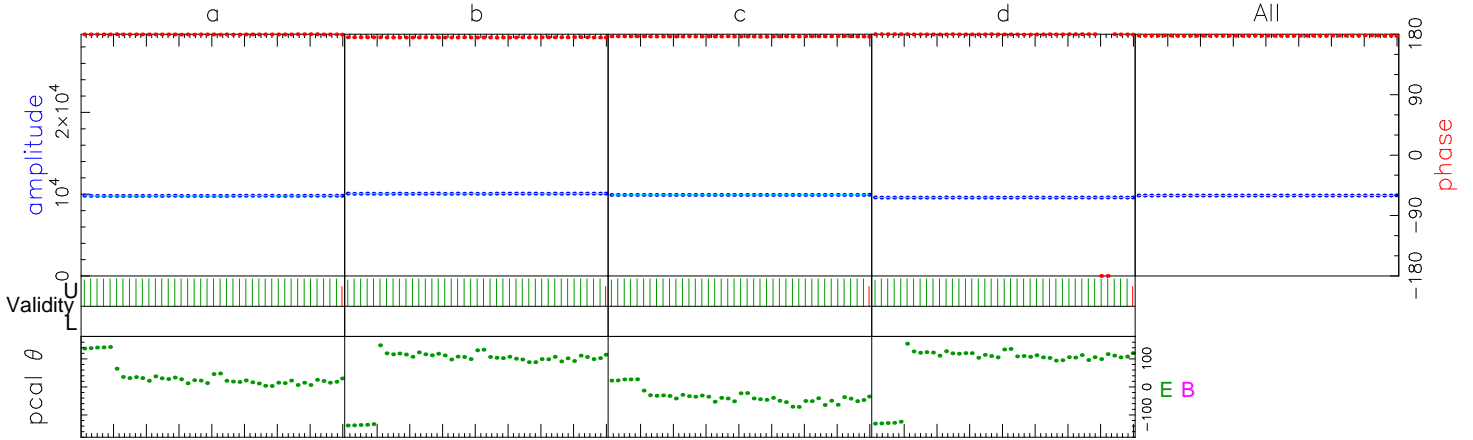
b: az 106.1 el 40.5 pa -43.1 E: az 272.3 el 24.5 pa 42.6 u,v (fr/asec) -10101.746 -1032.822
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/bE..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/bE.W.15.zrmosn



Fringe quality 9
 SNR 397072.8
 Int time 478.928
 Amp 9856.631
 Phase 314.2
 PFD 0.0e+00
 Delays (us)
 SBD -0.039335
 MBD -0.004949
 Fringe rate (Hz) 0.000000
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164051
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"



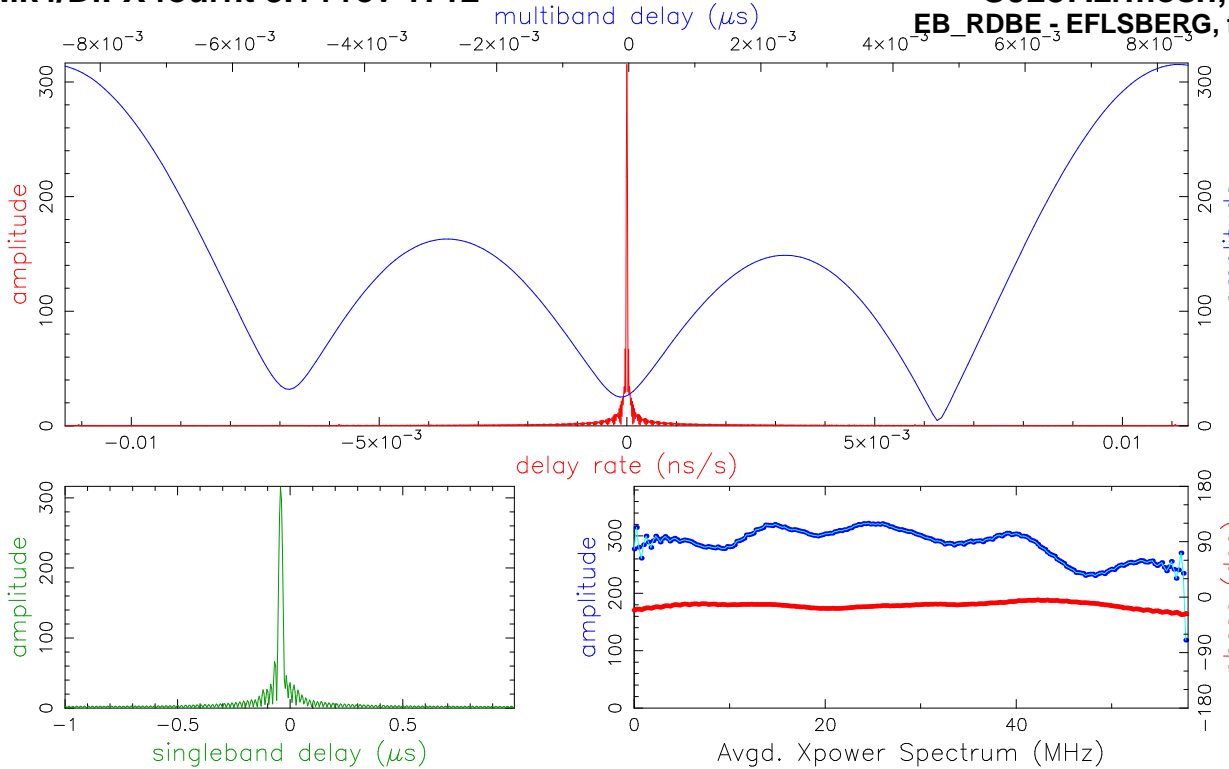
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	APs used	
B	0	0	0	0	PC freqs	
E:B	0:0	0:0	0:0	0:0	PC phase	
E:B	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
B	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
B	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	

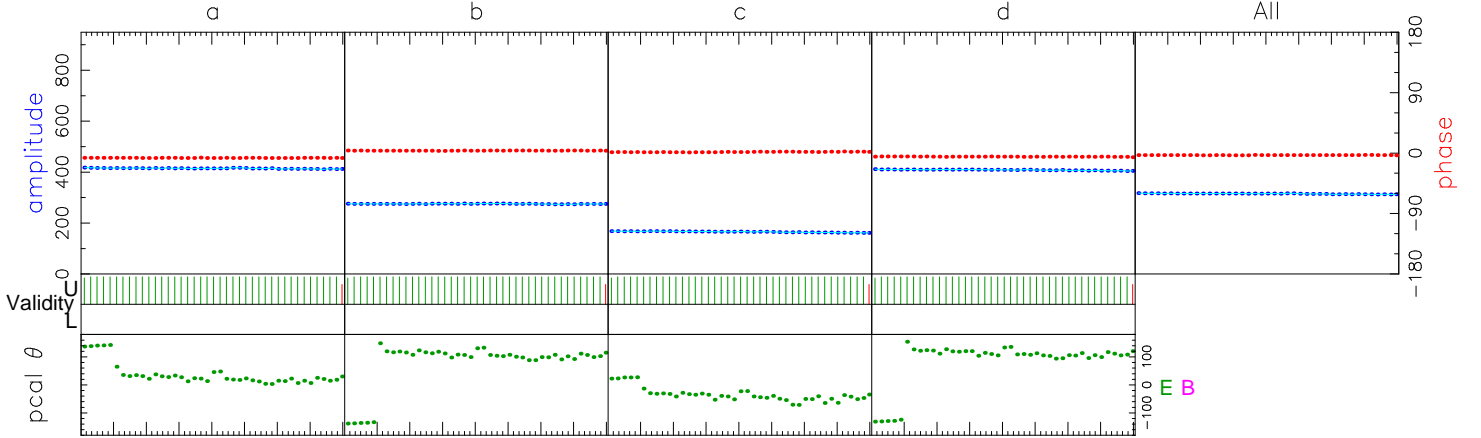
Group delay (usec)(sbd)	-5.39082188801E-01	Apriori delay (usec)	-5.00000000001E-01	Resid mbdelay (usec)	-4.94886E-03	+/-	6.1E-09
Sband delay (usec)	-5.39334620690E-01	Apriori clock (usec)	-5.00000000E-01	Resid sbdelay (usec)	-3.93346E-02	+/-	2.4E-08
Phase delay (usec)	-4.99994269324E-01	Apriori clockrate (us/s)	0.0000000E+00	Resid phdelay (usec)	5.73068E-06	+/-	9.3E-12
Delay rate (us/s)	3.54278809792E-12	Apriori rate (us/s)	0.00000000000E+00	Resid rate (us/s)	3.54279E-12	+/-	3.4E-14
Total phase (deg)	314.2	Apriori accel (us/s/s)	0.00000000000E+00	Resid phase (deg)	314.2	+/-	0.0

ph/seg (deg)	0.2	0.0	Search (2048X16)	9714.800	Pcal mode: MANUAL, MANUAL	PC period (AP's)	5, 5	
amp/seg (%)	0.2	0.0	Interp.	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000	
ph/frq (deg)	2.8	0.0	Inc. seg. avg.	9841.331	Bits/sample: 2x2	SampCntNorm: enabled	mb window (us)	-0.009 0.009
amp/frq (%)	1.8	0.0	Inc. frq. avg.	9847.076	Sample rate(MSamp/s): 116	Data rate(Mb/s): 928	dr window (ns/s)	-0.011 0.011
							ion window (TEC)	0.00 0.00



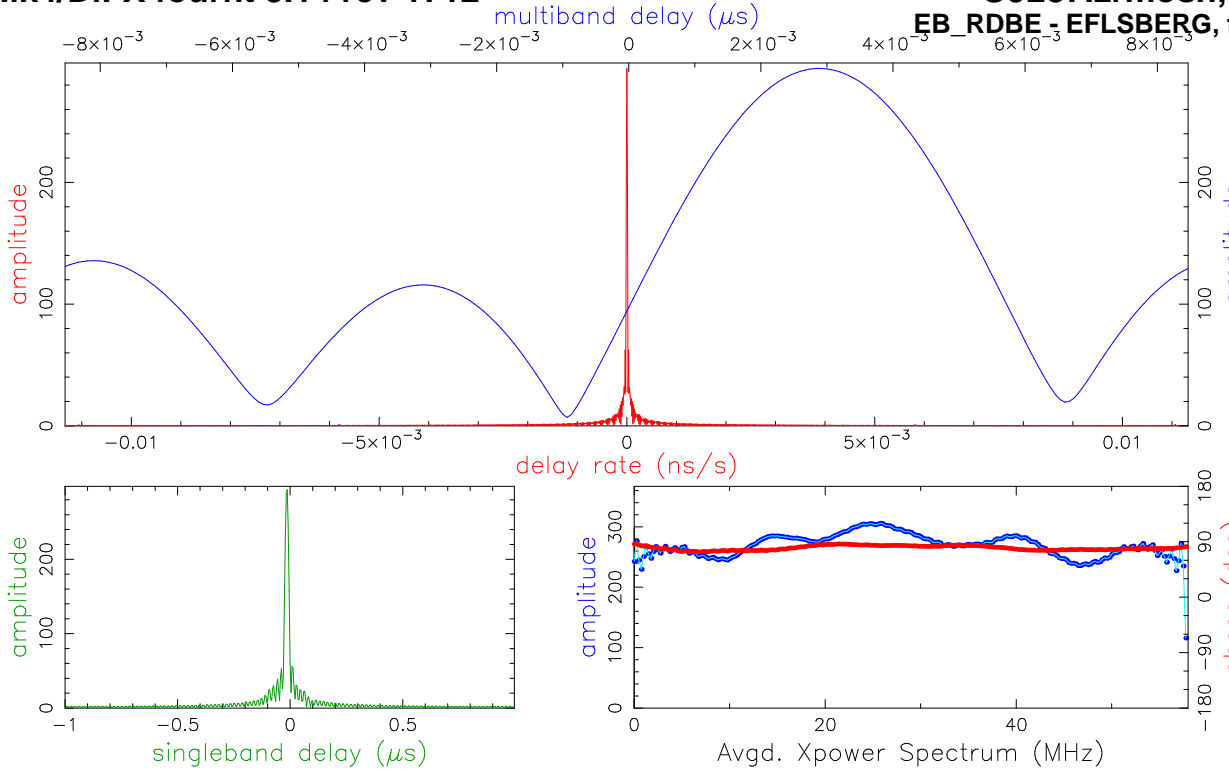
Fringe quality 8
 SNR 12752.5
 Int time 478.934
 Amp 316.556
 Phase 133.5
 PFD 0.0e+00
 Delays (us)
 SBD -0.042212
 MBD -0.008757
 Fringe rate (Hz)
 -0.000003
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164052
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	APs used	
B	0	0	0	0	PC freqs	
E:B	0:0	0:0	0:0	0:0	PC phase	
E:B	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
B	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
B	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	-5.42890581334E-01	Apriori delay (usec)	-5.00000000001E-01	Resid mbdelay (usec)	-8.75725E-03	+/- 1.9E-07
Sband delay (usec)	-5.42211586207E-01	Apriori clock (usec)	-5.00000000E-01	Resid sbdelay (usec)	-4.22116E-02	+/- 7.5E-07
Phase delay (usec)	-5.00000098113E-01	Apriori clockrate (us/s)	0.0000000E+00	Resid phdelay (usec)	-9.81124E-08	+/- 2.9E-10
Delay rate (us/s)	-3.54278809792E-11	Apriori rate (us/s)	0.00000000000E+00	Resid rate (us/s)	-3.54279E-11	+/- 1.0E-12
Total phase (deg)		133.5	Apriori accel (us/s/s)	0.00000000000E+00	Resid phase (deg)	133.5 +/- 0.0

ph/seg (deg) 0.1 0.0 Search (2048X16) 313.802 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 amp/seg (%) 0.6 0.1 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 ph/frq (deg) 6.7 0.0 Inc. seg. avg. 315.242 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 amp/frq (%) 32.6 0.0 Inc. frq. avg. 316.191 Sample rate(MSamp/s): 116 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite dr window (ns/s) -0.011 0.011
 E: az 272.3 el 24.5 pa 42.6 B: az 272.3 el 24.5 pa 42.5 u,v (fr/asec) 0.000 0.000 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EB..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EB.W.107.zrmosn

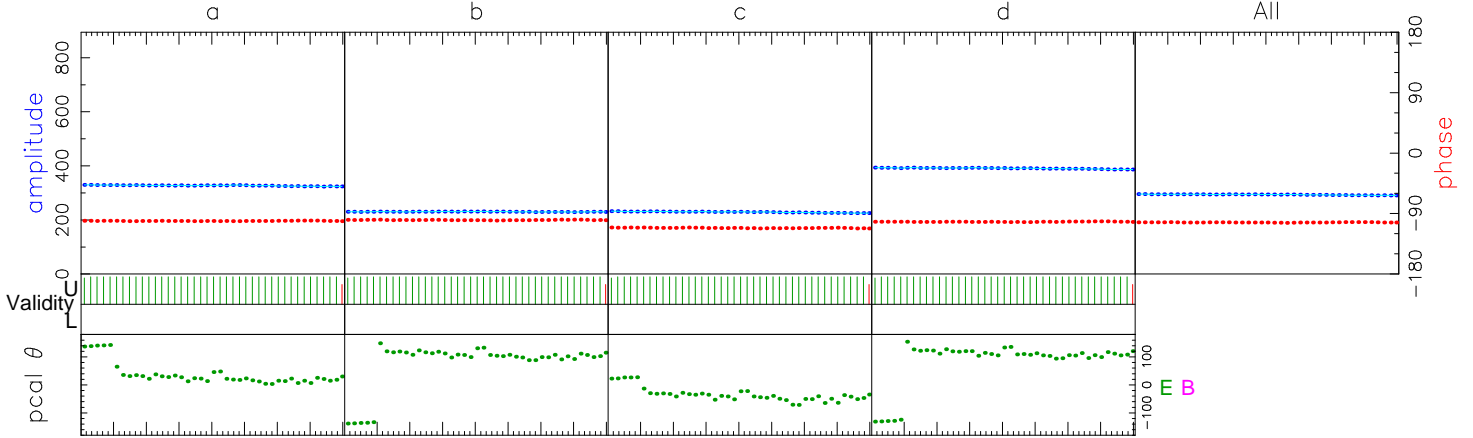


Fringe quality 8

SNR 12012.5
 Int time 478.928
 Amp 298.188
 Phase -34.9
 PFD 0.0e+00
 Delays (us)
 SBD -0.014636
 MBD 0.002933
 Fringe rate (Hz) 0.000005
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512

Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164054
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



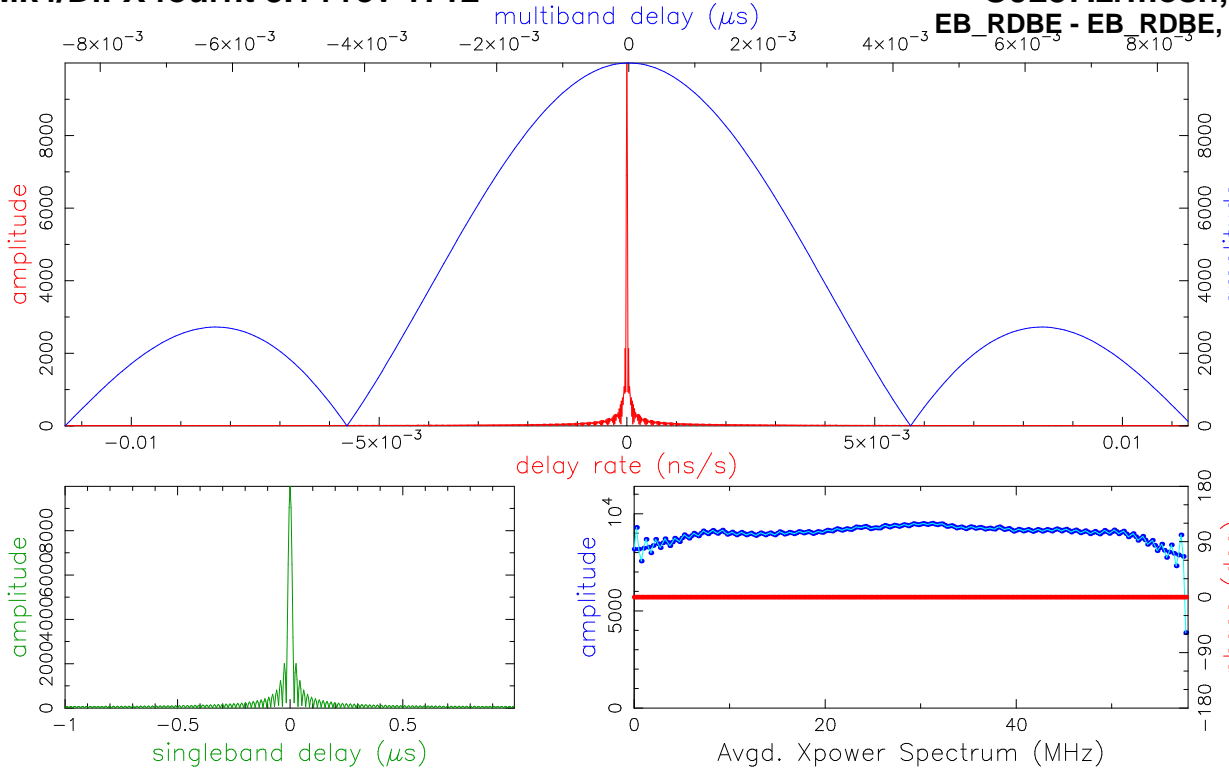
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	Ampl.	294.4
B	0	0	0	0	Sbd box	229.6
E:B	0:0	0:0	0:0	0:0	APs used	
E:B	0:0	0:0	0:0	0:0	PC freqs	
E	1000	1000	1000	1000	PC phase	
B	1000	1000	1000	1000	Manl PC	
E	W00UR	W01UR	W02UR	W03UR	PC amp	
B	W00UL	W01UL	W02UL	W03UL	Chan ids	
					Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-5.14133384534E-01	Apriori delay (usec)	-5.00000000001E-01	Resid mbdelay (usec)	2.93328E-03	+/-	2.0E-07
Sband delay (usec)	-5.14636413794E-01	Apriori clock (usec)	-5.00000000E-01	Resid sbdelay (usec)	-1.46364E-02	+/-	7.9E-07
Phase delay (usec)	-5.00003326130E-01	Apriori clockrate (us/s)	0.0000000E+00	Resid phdelay (usec)	-3.32613E-06	+/-	3.1E-10
Delay rate (us/s)	5.24332638492E-11	Apriori rate (us/s)	0.00000000000E+00	Resid rate (us/s)	5.24333E-11	+/-	1.1E-12
Total phase (deg)		Apriori accel (us/s/s)	0.00000000000E+00	Resid phase (deg)	-34.9	+/-	0.0

ph/seg (deg)	0.3	Theor.	0.0	Amplitude	298.188 +/- 0.025	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5
amp/seg (%)	1.6	Search (2048X16)	0.000	Search	290.750	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000
ph/frq (deg)	6.5	Inc. seg. avg.	293.634	Inc. seg. avg.	293.634	Bits/sample:	2x2	SampCntNorm:	enabled
amp/frq (%)	23.0	Inc. frq. avg.	294.401	Inc. frq. avg.	294.401	Sample rate(MSamp/s):	116	dr window (ns/s)	-0.011 0.011
						Data rate(Mb/s):	928	ion window (TEC)	0.00 0.00
						nlags:	232	t_cohere	infinite

E: az 272.3 el 24.5 pa 42.6 B: az 272.3 el 24.5 pa 42.5 u,v (fr/asec) 0.000 0.000 simultaneous interpolator

Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EB..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EB.W.108.zrmosn

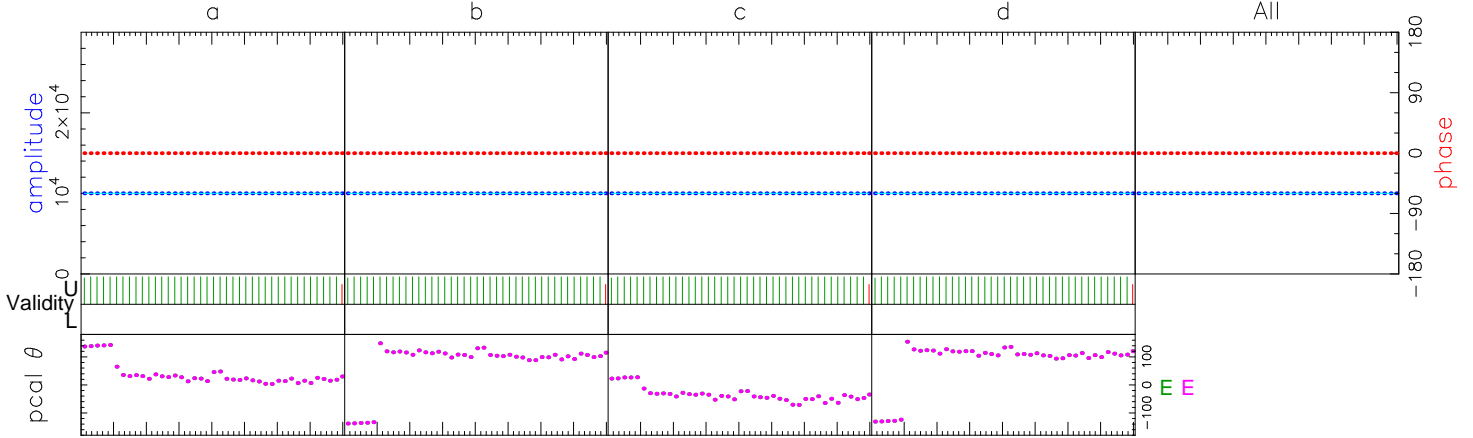


Fringe quality 9

SNR 402853.2
Int time 478.939
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) 86140.000
AP (sec) 0.512

Exp. mg002
Exper # 16383
Yr:day 2017:093
Start 004500.51
Stop 005300.26
FRT 004900.00
Corr/FF/build
2017:237:075717
2017:243:164056
2017:170:130423
RA & Dec (J2000)
08h54m48.8749s
+20°06'30.641"

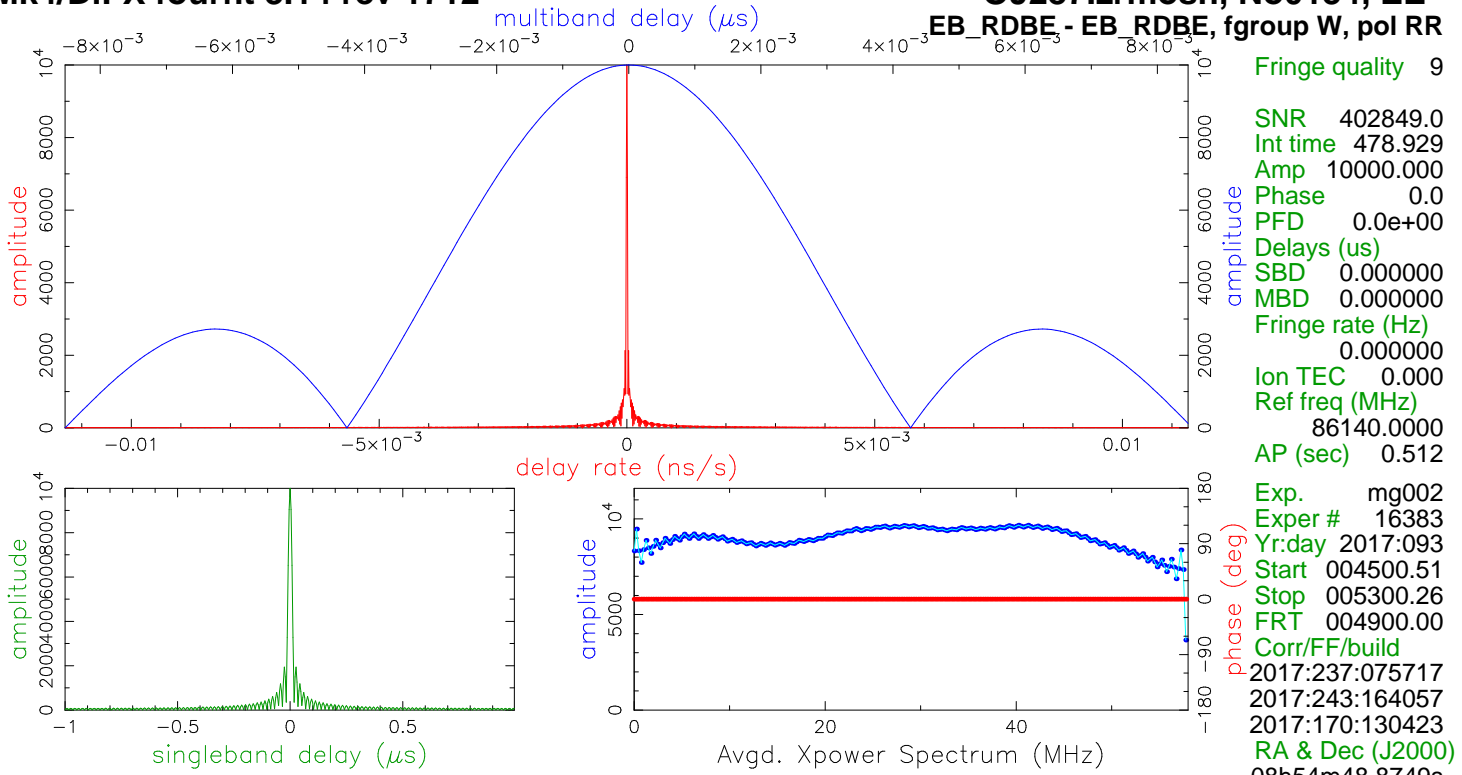
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



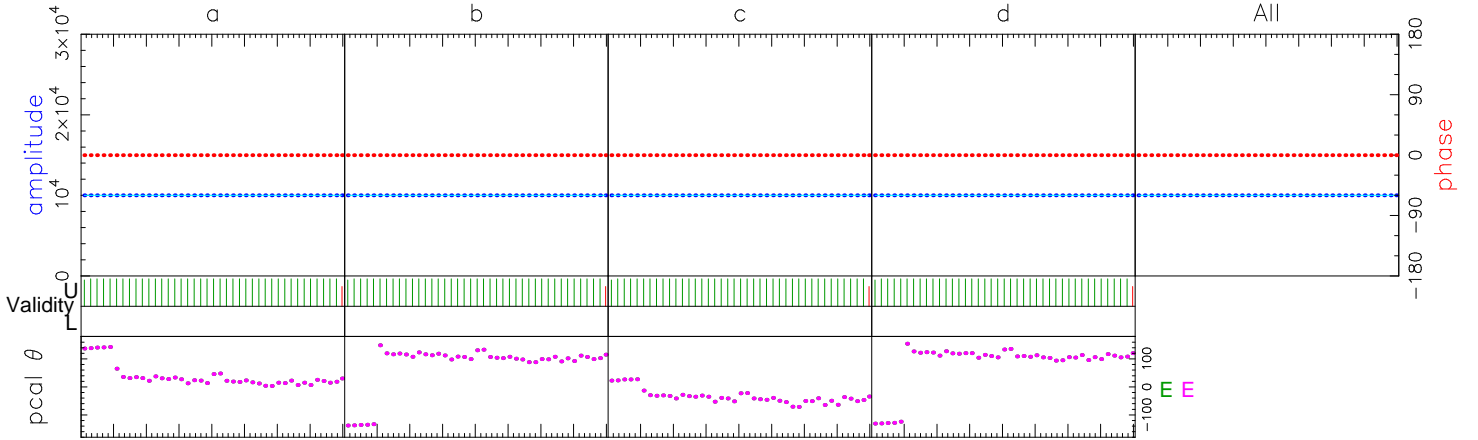
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	Ampl.	10000.0
E:E	0:0	0:0	0:0	0:0	Sbd box	233.0
E:E	0:0	0:0	0:0	0:0	APs used	
E	1000	1000	1000	1000	PC freqs	
E	1000	1000	1000	1000	PC freqs	
E	W00UL	W01UL	W02UL	W03UL	PC phase	
E	W00UL	W01UL	W02UL	W03UL	Mani PC	
					PC amp	
					Chan ids	
					Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	0.0000000000E+00	Apriori delay (usec)	0.0000000000E+00	Resid mbdelay (usec)	0.00000E+00	+/-	6.0E-09
Sband delay (usec)	0.0000000000E+00	Apriori clock (usec)	0.0000000E+00	Resid sbdelay (usec)	0.00000E+00	+/-	2.4E-08
Phase delay (usec)	0.0000000000E+00	Apriori clockrate (us/s)	0.0000000E+00	Resid phdelay (usec)	0.00000E+00	+/-	9.2E-12
Delay rate (us/s)	0.0000000000E+00	Apriori rate (us/s)	0.0000000000E+00	Resid rate (us/s)	0.00000E+00	+/-	3.3E-14
Total phase (deg)	0.0	Apriori accel (us/s/s)	0.0000000000E+00	Resid phase (deg)	0.0	+/-	0.0

ph/seg (deg)	0.0	RMS	0.0	Theor.	0.0	Amplitude	9999.999 +/- 0.025	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5	sb window (us)	-1.000	1.000	
amp/seg (%)	0.0		0.0		0.0	Search (2048X16)	9999.999	Pcal rate:	0.000E+00, 0.000E+00 (us/s)			mb window (us)	-0.009	0.009	
ph/frq (deg)	0.0		0.0		0.0	Interp.	0.000	Bits/sample:	2x2	SampCntNorm:	enabled	dr window (ns/s)	-0.011	0.011	
amp/frq (%)	0.0		0.0		0.0	Inc. seg. avg.	10000.000	Sample rate(MSamp/s):	116			ion window (TEC)	0.00	0.00	
			0.0		0.0	Inc. frq. avg.	9999.999	Data rate(Mb/s):	928	nlags:	232	t_cohere	infinite		

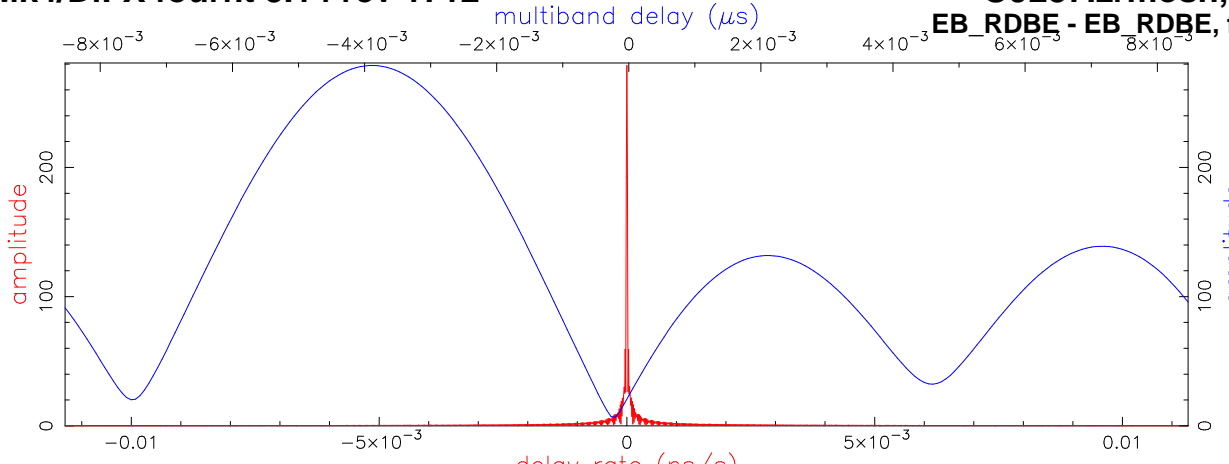


Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

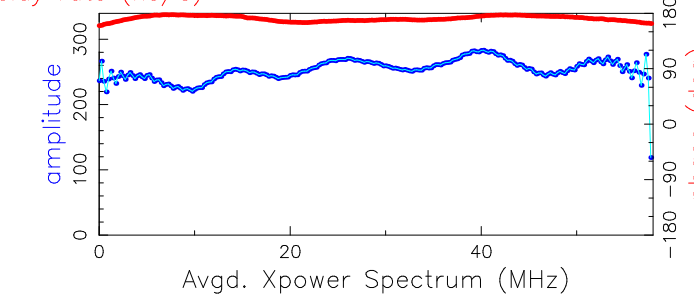
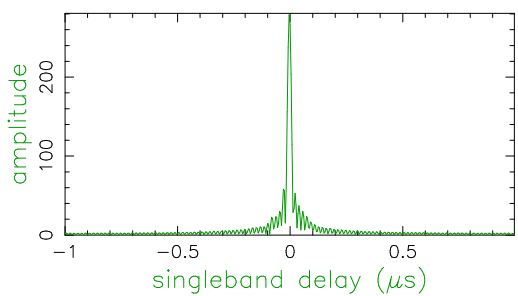


	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
0.0	0.0	0.0	0.0	0.0	Phase	0.0
10000.0	10000.0	10000.0	10000.0	10000.0	Ampl.	10000.0
233.0	233.0	233.0	233.0	233.0	Sbd box	233.0
U/L 937/0	937/0	937/0	937/0	937/0	APs used	
E 3890	296	1703	3109	3109	PC freqs	
E 3890	296	1703	3109	3109	PC freqs	
E:E 0:0	0:0	0:0	0:0	0:0	PC phase	
E:E 0:0	0:0	0:0	0:0	0:0	Mani PC	
E 1000	1000	1000	1000	1000	PC amp	
E 1000	1000	1000	1000	1000		
E W00UR	W01UR	W02UR	W03UR		Chan ids	
E W00UR	W01UR	W02UR	W03UR		Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	0.0000000000E+00	Apriori delay (usec)	0.0000000000E+00	Resid mbdelay (usec)	0.00000E+00	+/- 6.0E-09
Sband delay (usec)	0.0000000000E+00	Apriori clock (usec)	0.0000000E+00	Resid sbdelay (usec)	0.00000E+00	+/- 2.4E-08
Phase delay (usec)	0.0000000000E+00	Apriori clockrate (us/s)	0.0000000E+00	Resid phdelay (usec)	0.00000E+00	+/- 9.2E-12
Delay rate (us/s)	0.0000000000E+00	Apriori rate (us/s)	0.0000000000E+00	Resid rate (us/s)	0.00000E+00	+/- 3.3E-14
Total phase (deg)	0.0	Apriori accel (us/s/s)	0.0000000000E+00	Resid phase (deg)	0.0	+/- 0.0

	RMS	Theor.	Amplitude	10000.000 +/- 0.025	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5
ph/seg (deg)	0.0	0.0	Search (2048X16)	10000.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us) -1.000 1.000
amp/seg (%)	0.0	0.0	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled mb window (us) -0.009 0.009
ph/frq (deg)	0.0	0.0	Inc. seg. avg.	10000.000	Sample rate(MSamp/s): 116	dr window (ns/s) -0.011 0.011
amp/frq (%)	0.0	0.0	Inc. frq. avg.	10000.000	Data rate(Mb/s): 928	nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00

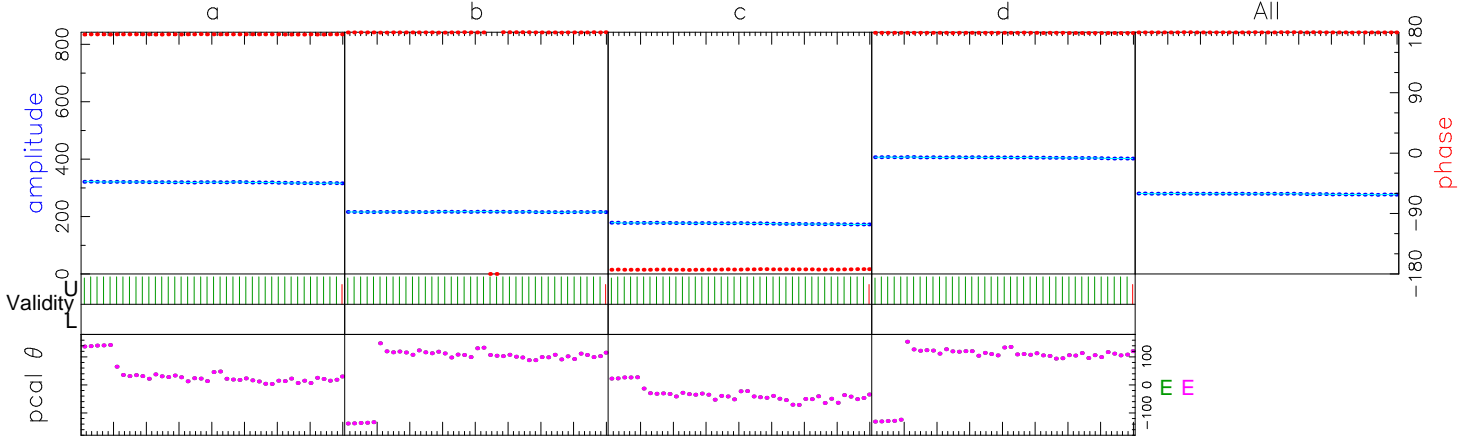


Fringe quality 8
 SNR 11313.6
 Int time 478.939
 Amp 280.837
 Phase 179.6
 PFD 0.0e+00
 Delays (us)
 SBD -0.003160
 MBD -0.003930
 Fringe rate (Hz)
 -0.000004
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164059
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"



Avgd. Xpower Spectrum (MHz)

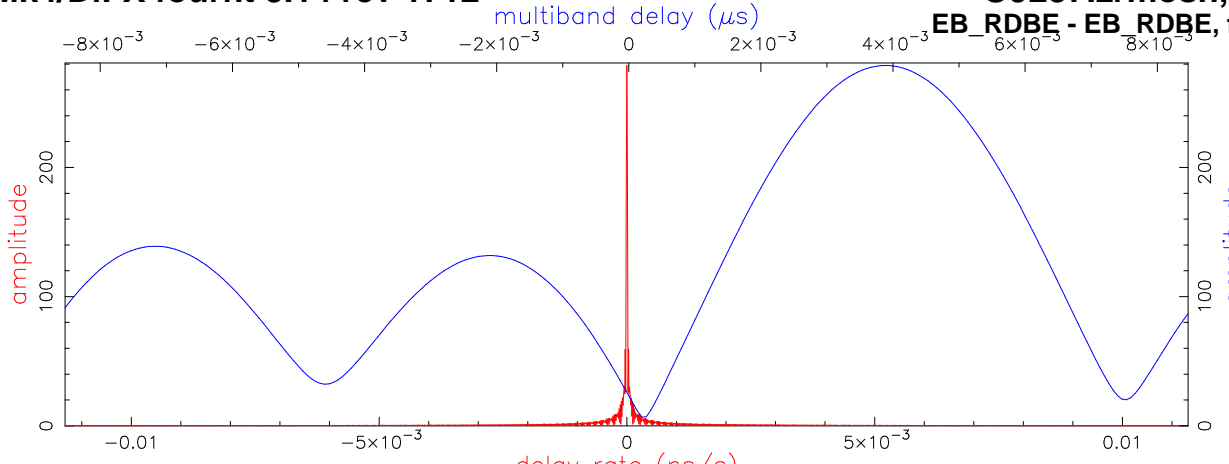
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	176.6	179.6	-173.2	178.9	Phase	179.6
	319.2	216.3	176.1	405.6	Ampl.	279.3
	232.8	232.3	231.4	232.3	Sbd box	232.3
U/L	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	
E	3890	296	1703	3109	PC freqs	
E:E	0:0	0:0	0:0	0:0	PC phase	
E:E	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
E	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
E	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-3.92997546667E-03	Apriori delay (usec)	0.00000000000E+00	Resid mbdelay (usec)	-3.92998E-03	+/-	2.1E-07
Sband delay (usec)	-3.15972413793E-03	Apriori clock (usec)	0.00000000000E+00	Resid sbdelay (usec)	-3.15972E-03	+/-	8.4E-07
Phase delay (usec)	5.79298675825E-06	Apriori clockrate (us/s)	0.00000000000E+00	Resid phdelay (usec)	5.79299E-06	+/-	3.3E-10
Delay rate (us/s)	-4.32220147946E-11	Apriori rate (us/s)	0.00000000000E+00	Resid rate (us/s)	-4.32220E-11	+/-	1.2E-12
Total phase (deg)	179.6	Apriori accel (us/s/s)	0.00000000000E+00	Resid phase (deg)	179.6	+/-	0.0

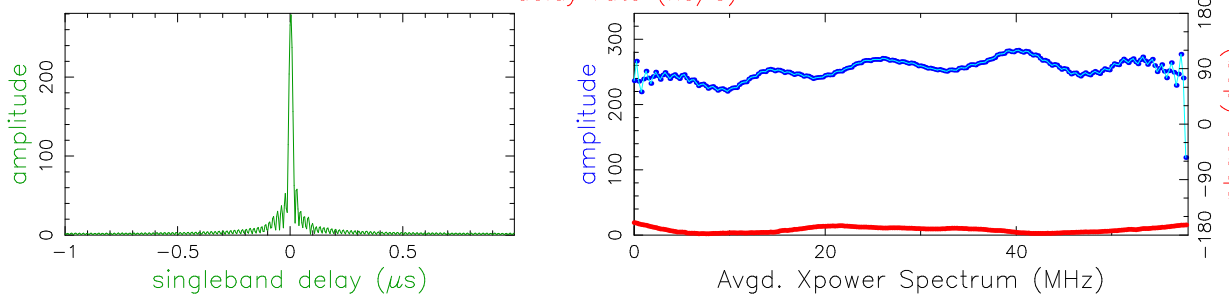
ph/seg (deg)	0.1	0.0	Amplitude	280.837 +/- 0.025	Pcal mode: MANUAL, MANUAL	PC period (AP's)	5, 5	
amp/seg (%)	0.8	0.1	Search (2048X16)	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000	
ph/frq (deg)	5.5	0.0	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled	mb window (us)	-0.009 0.009
amp/frq (%)	31.9	0.0	Inc. seg. avg.	278.837	Sample rate(MSamp/s): 116	dr window (ns/s)	-0.011 0.011	
			Inc. frq. avg.	279.296	Data rate(Mb/s): 928	nlags: 232 t_cohere infinite	ion window (TEC)	0.00 0.00



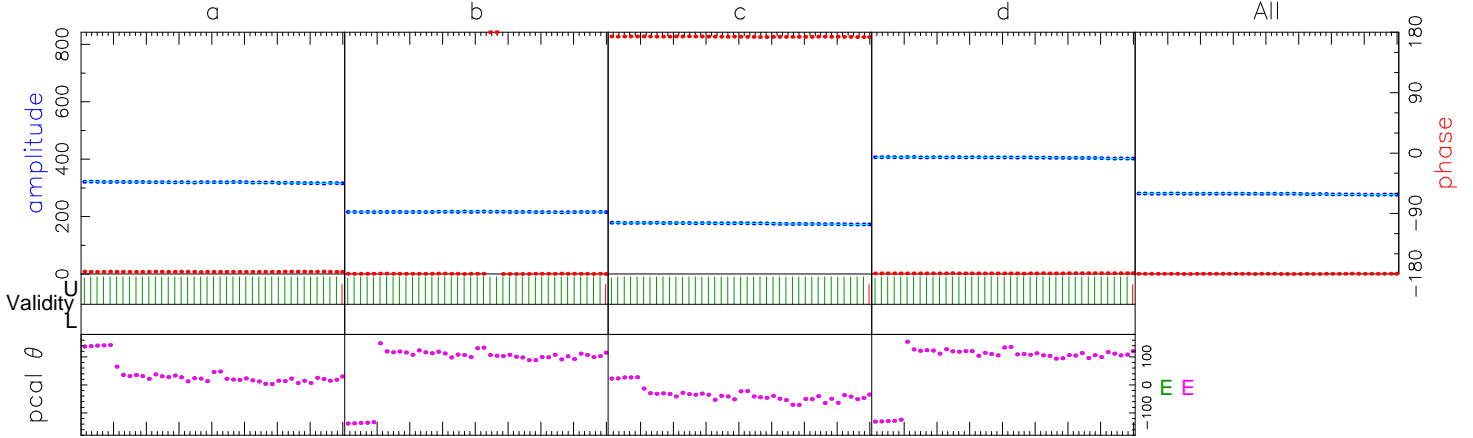
Fringe quality 8

SNR 11313.7
 Int time 478.929
 Amp 280.843
 Phase -179.6
 PFD 0.0e+00
 Delays (us)
 SBD 0.003160
 MBD 0.003930
 Fringe rate (Hz)
 0.000004
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512

Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164101
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"



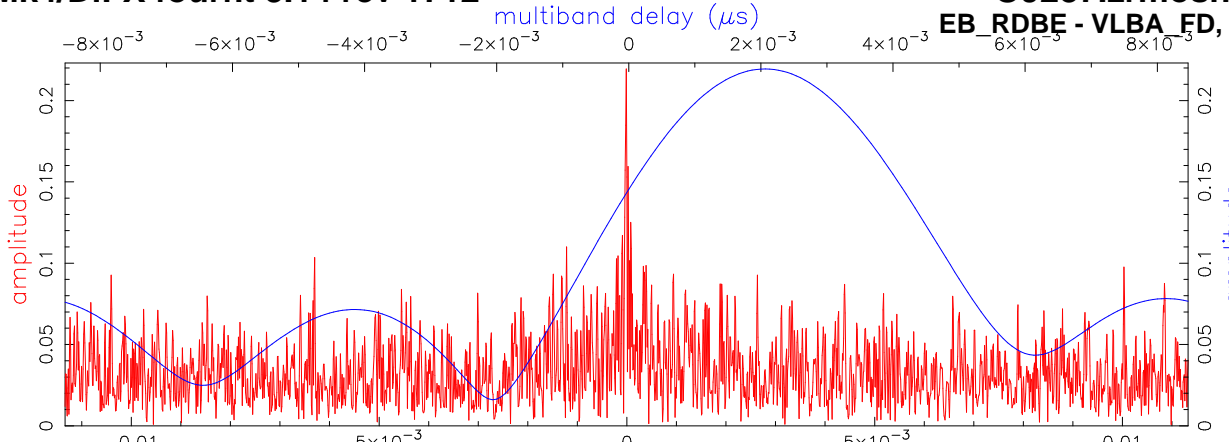
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



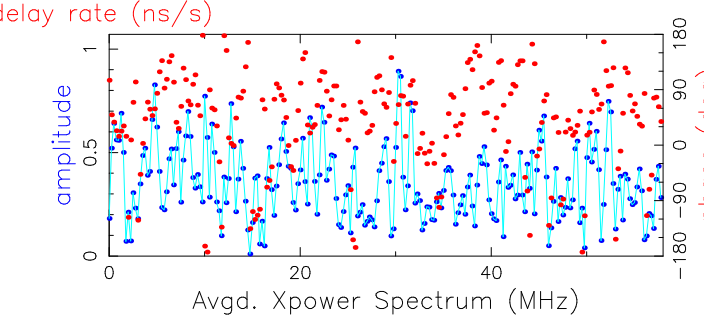
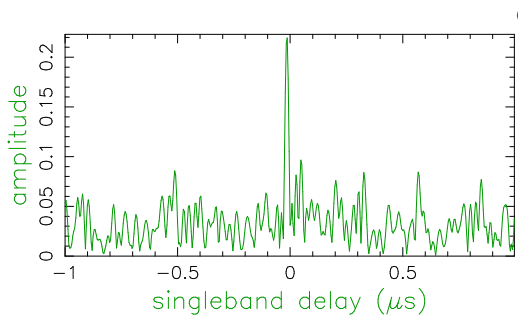
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	-176.6	-179.6	173.2	-178.9	Phase	-179.6
	319.2	216.3	176.1	405.6	Ampl.	279.3
	233.2	233.7	234.6	233.7	Sbd box	233.7
U/L	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	
E	3890	296	1703	3109	PC freqs	
E:E	0:0	0:0	0:0	0:0	PC phase	
E:E	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
E	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
E	W00UL	W01UL	W02UL	W03UL	Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	3.92997546667E-03	Apriori delay (usec)	0.00000000000E+00	Resid mbdelay (usec)	3.92998E-03	+/-	2.1E-07
Sband delay (usec)	3.15972413793E-03	Apriori clock (usec)	0.0000000E+00	Resid sbdelay (usec)	3.15972E-03	+/-	8.4E-07
Phase delay (usec)	-5.79298675797E-06	Apriori clockrate (us/s)	0.0000000E+00	Resid phdelay (usec)	-5.79299E-06	+/-	3.3E-10
Delay rate (us/s)	4.32220147946E-11	Apriori rate (us/s)	0.00000000000E+00	Resid rate (us/s)	4.32220E-11	+/-	1.2E-12
Total phase (deg)		Apriori accel (us/s/s)	0.00000000000E+00	Resid phase (deg)	-179.6	+/-	0.0

ph/seg (deg)	0.1	Theor.	0.0	Amplitude	280.843 +/- 0.025	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5
amp/seg (%)	0.8		0.0	Search (2048X16)	0.000	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000
ph/frq (deg)	5.5		0.0	Interp.	0.000	Bits/sample:	2x2	SampCntNorm:	enabled
amp/frq (%)	31.9		0.0	Inc. seg. avg.	278.843	Sample rate(MSamp/s):	116	mb window (us)	-0.009 0.009
				Inc. frq. avg.	279.301	Data rate(Mb/s):	928	dr window (ns/s)	-0.011 0.011
						nlags:	232	ion window (TEC)	0.00 0.00

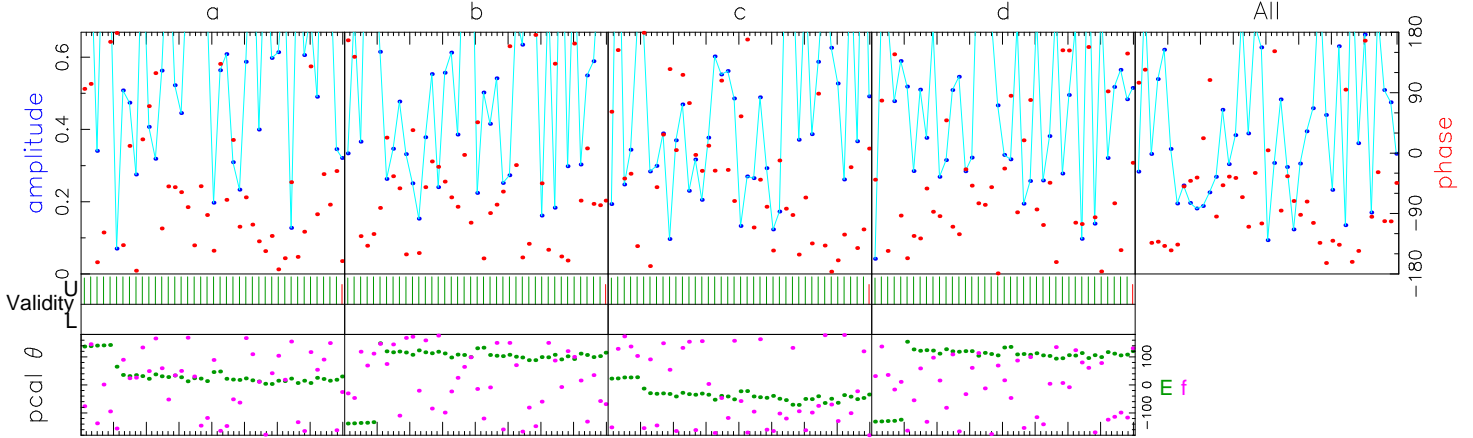


Fringe quality 9
 SNR 9.0
 Int time 478.712
 Amp 0.223
 Phase -38.9
 PFD 4.5e-11
 Delays (us)
 SBD -0.014591
 MBD 0.002111
 Fringe rate (Hz)
 -0.001122
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512



Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164103
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

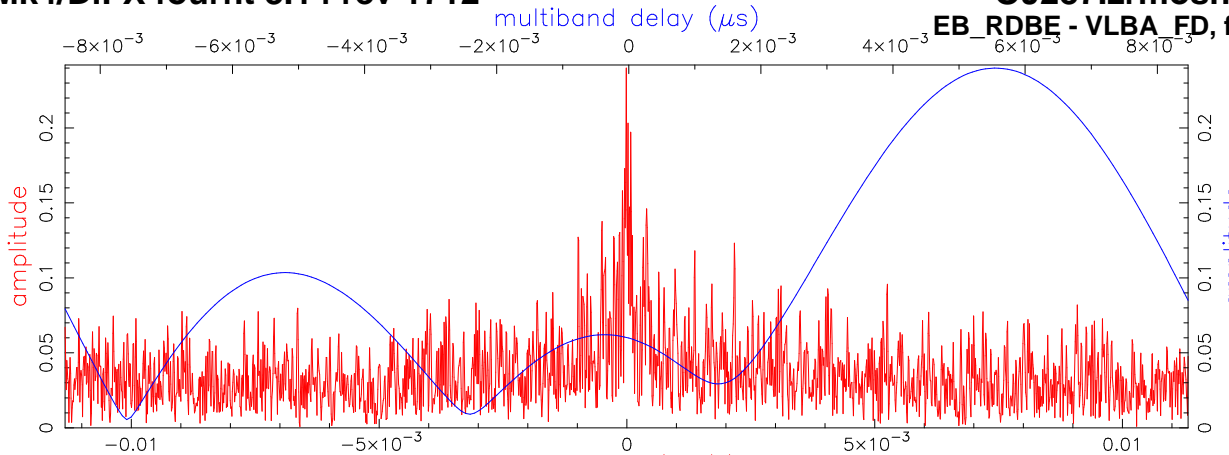
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



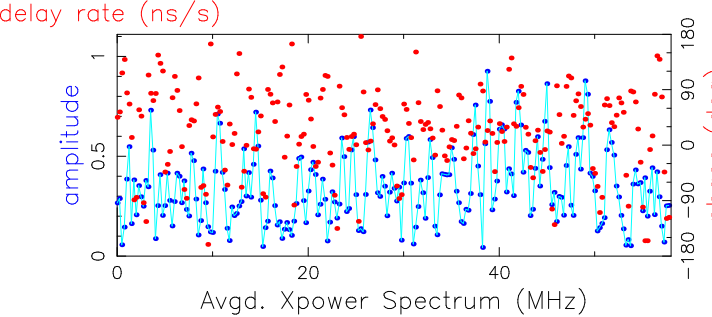
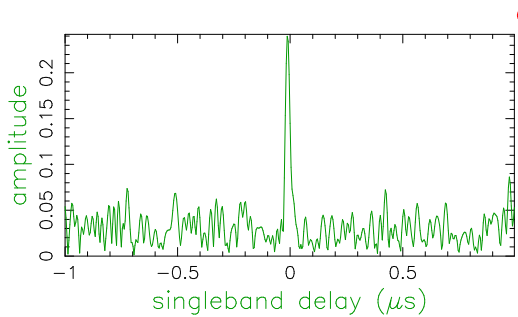
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	
f	3890	296	1703	3109	PC freqs	
E:f	0:0	0:0	0:0	0:0	PC phase	
E:f	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
f	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
f	W00UL	W01UL	W02UL	W03UL	Tracks	

Group delay (usec)(sbd)	-9.39907581280E+03	Apriori delay (usec)	-9.39906085750E+03	Resid mbdelay (usec)	2.11137E-03	+/- 2.7E-04
Sband delay (usec)	-9.39907544895E+03	Apriori clock (usec)	2.9549957E+01	Resid sbdelay (usec)	-1.45914E-02	+/- 1.1E-03
Phase delay (usec)	-9.39906086095E+03	Apriori clockrate (us/s)	4.2493721E-07	Resid phdelay (usec)	-3.45662E-06	+/- 4.1E-07
Delay rate (us/s)	-1.60747104058E+00	Apriori rate (us/s)	-1.60747102756E+00	Resid rate (us/s)	-1.30212E-08	+/- 1.5E-09
Total phase (deg)	-134.3	Apriori accel (us/s/s)	6.02773689857E-05	Resid phase (deg)	-38.9	+/- 12.8

ph/seg (deg)	69.5	Theor.	40.8	Amplitude	0.223 +/- 0.025	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
amp/seg (%)	125.6		71.3	Search (2048X16)	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.009	0.009
ph/frq (deg)	8.9		12.8	Interp.	0.328	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
amp/frq (%)	22.4		22.3	Inc. seg. avg.	0.215	Sample rate(MSamp/s): 116		ion window (TEC)	0.00	0.00
				Inc. frq. avg.	0.215	Data rate(Mb/s): 928	nlags: 232	t_cohere infinite		

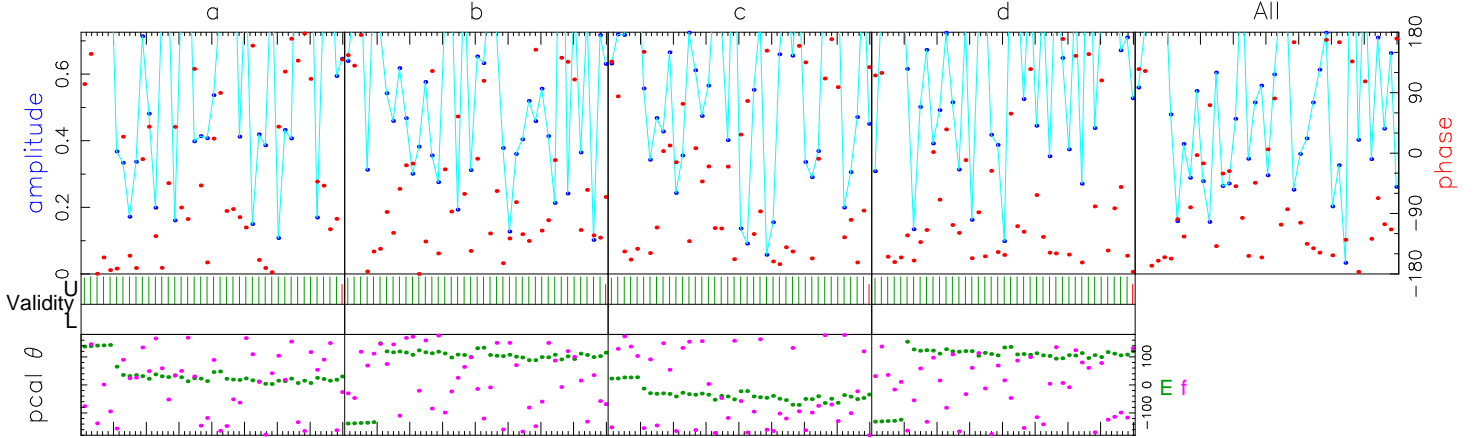


Fringe quality 9
 SNR 9.7
 Int time 478.705
 Amp 0.242
 Phase -76.3
 PFD 3.6e-14
 Delays (us)
 SBD -0.011455
 MBD 0.005565
 Fringe rate (Hz)
 -0.000945
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512



Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164105
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

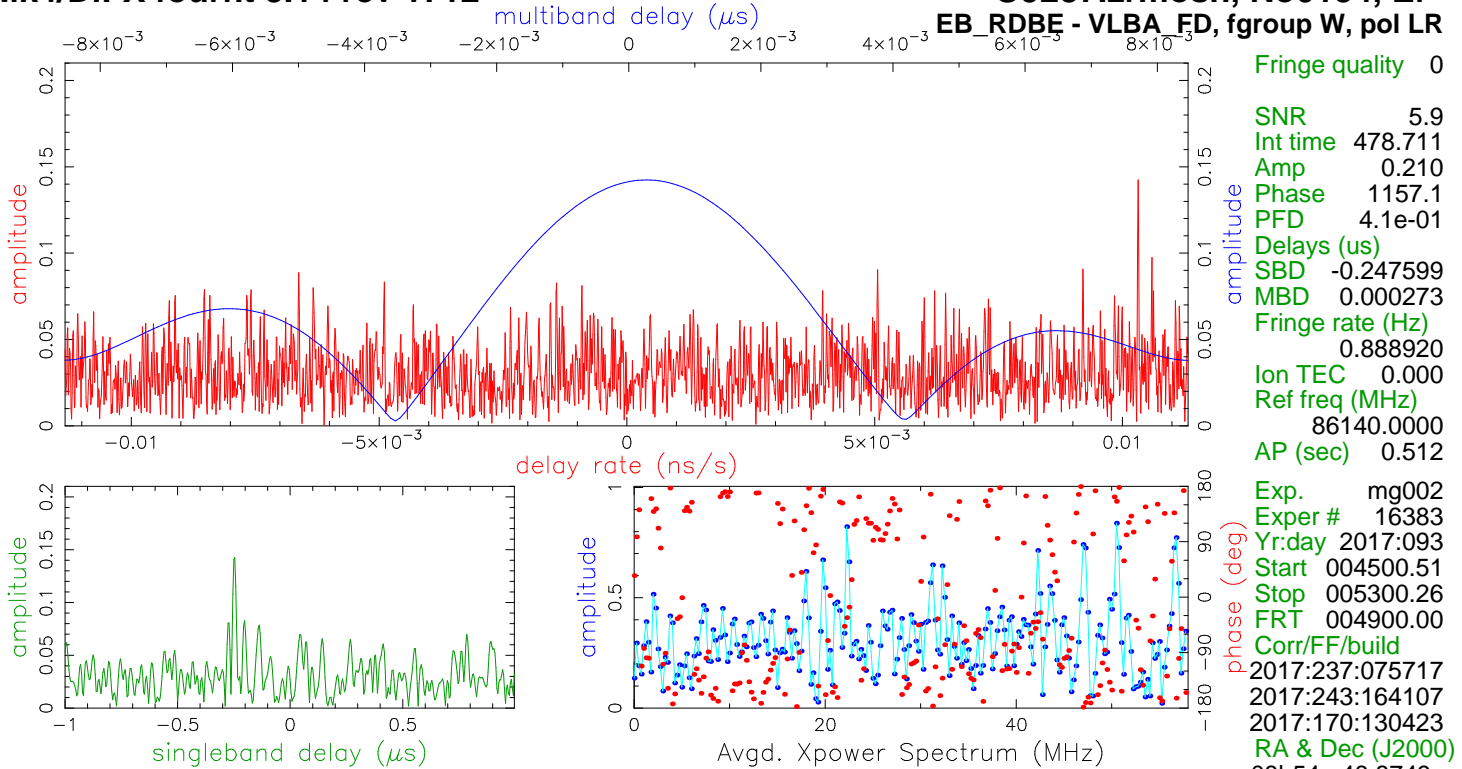


	86151.11	86209.70	86268.30	86326.89	86385.48	All
U/L	937/0	937/0	937/0	937/0	937/0	937/0
E	3890	296	1703	3109	3109	3109
f	3890	296	1703	3109	3109	3109
E:f	0:0	0:0	0:0	0:0	0:0	0:0
E:f	0:0	0:0	0:0	0:0	0:0	0:0
E	1000	1000	1000	1000	1000	1000
f	1000	1000	1000	1000	1000	1000
E	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR
f	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR

	86151.11	86209.70	86268.30	86326.89	86385.48	All
Group delay (usec)(sbd)	-9.39907235912E+03	-9.39907231267E+03	-9.39906085750E+03	-9.39906085750E+03	-9.39906085750E+03	-9.39906085750E+03
Sband delay (usec)	-9.39907231267E+03	-9.39906086216E+03	-9.39906085750E+03	-9.39906085750E+03	-9.39906085750E+03	-9.39906085750E+03
Phase delay (usec)	-9.39906086216E+03	-9.39906085750E+03	-9.39906085750E+03	-9.39906085750E+03	-9.39906085750E+03	-9.39906085750E+03
Delay rate (us/s)	-1.60747103853E+00	-1.60747103853E+00	-1.60747102756E+00	-1.60747102756E+00	-1.60747102756E+00	-1.60747102756E+00
Total phase (deg)		-171.7				

	86151.11	86209.70	86268.30	86326.89	86385.48	All
Validity	100%	100%	100%	100%	100%	100%
pcal θ	100	100	100	100	100	100

E: az 272.3 el 24.5 pa 42.6 f: az 100.0 el 56.5 pa -64.6 u,v (fr/asec) 9902.939 3849.499 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ef..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ef.W.114.zrmosn

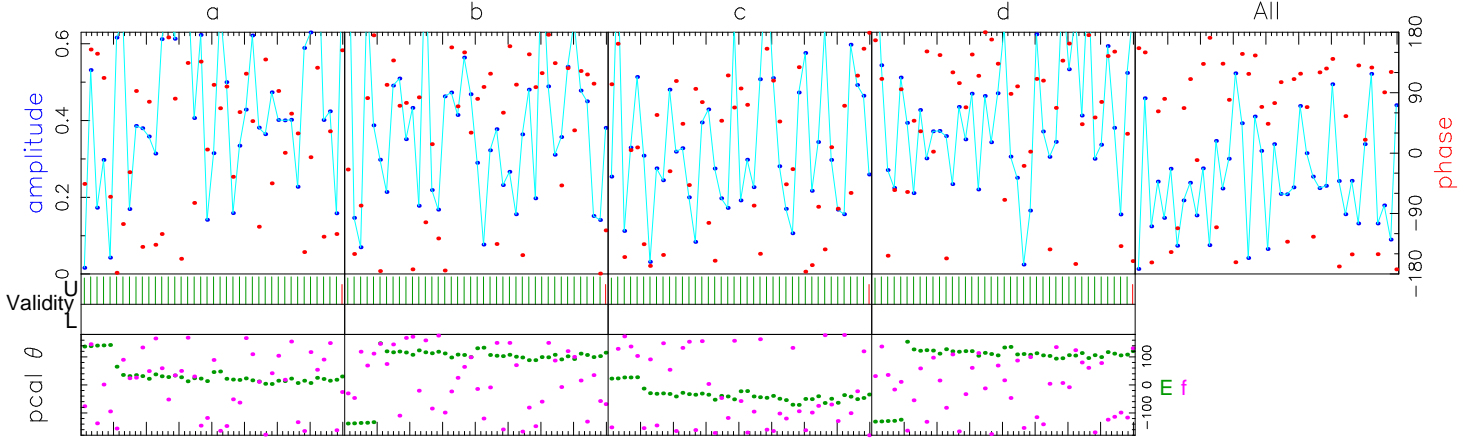


Fringe quality 0

SNR 5.9
 Int time 478.711
 Amp 0.210
 Phase 1157.1
 PFD 4.1e-01
 Delays (us)
 SBD -0.247599
 MBD 0.000273
 Fringe rate (Hz)
 0.888920
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512

Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164107
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

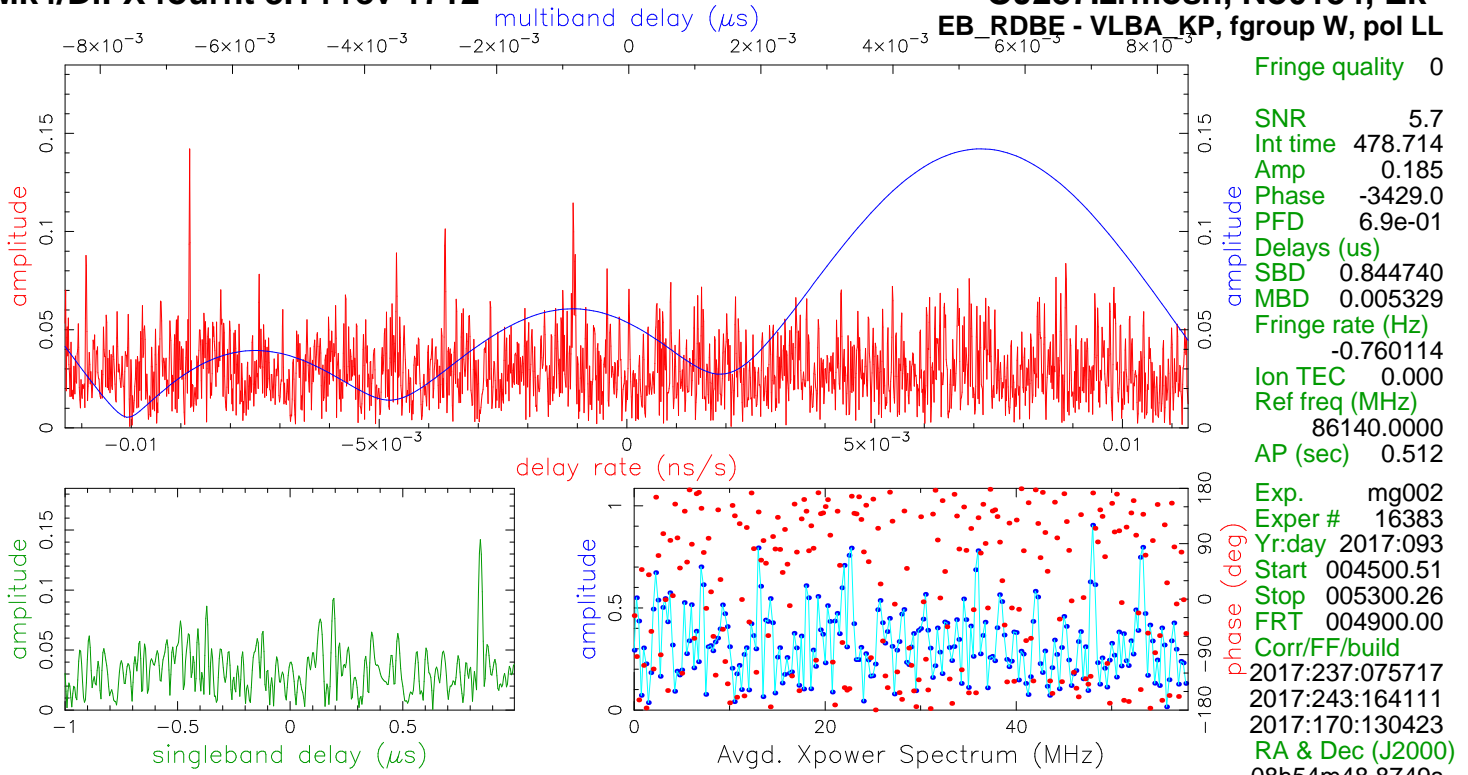


	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	133.2
f	3890	296	1703	3109	PC freqs	0.2
E:f	0:0	0:0	0:0	0:0	PC phase	175.6
E:f	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
f	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
f	W00UR	W01UR	W02UR	W03UR	Tracks	

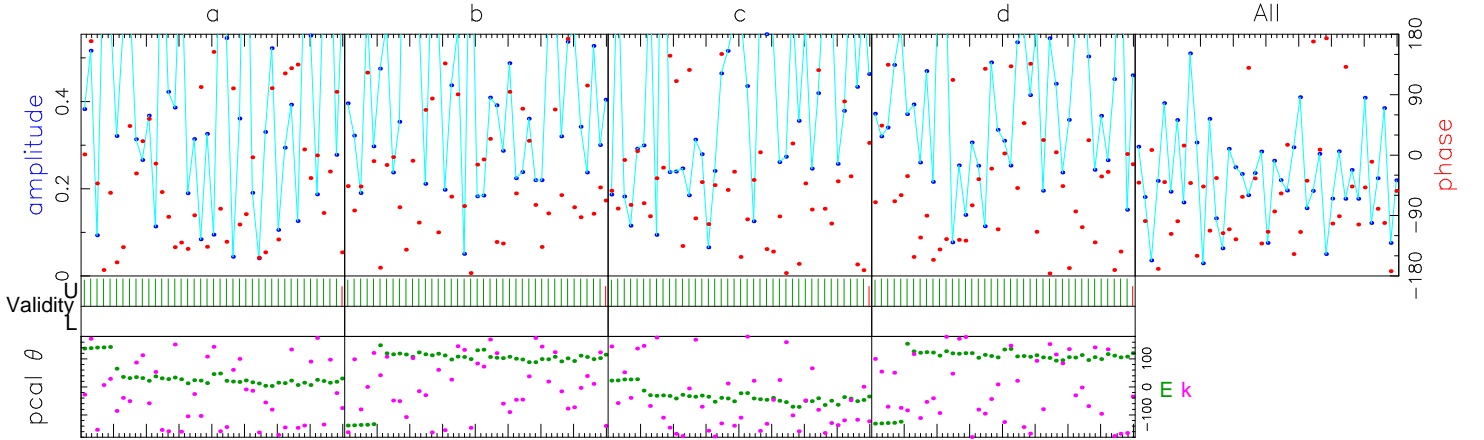
Group delay (usec)(sbd)	-9.39931658427E+03	Apriori delay (usec)	-9.39906085750E+03	Resid mbdelay (usec)	2.73233E-04	+/-	4.1E-04
Sband delay (usec)	-9.39930845667E+03	Apriori clock (usec)	2.9549957E+01	Resid sbdelay (usec)	-2.47599E-01	+/-	1.6E-03
Phase delay (usec)	-9.39906085320E+03	Apriori clockrate (us/s)	4.2493721E-07	Resid phdelay (usec)	4.29679E-06	+/-	6.3E-07
Delay rate (us/s)	-1.60746070808E+00	Apriori rate (us/s)	-1.60747102756E+00	Resid rate (us/s)	1.03195E-05	+/-	2.3E-09
Total phase (deg)	1061.7	Apriori accel (us/s/s)	6.02773689857E-05	Resid phase (deg)	1157.1	+/-	19.6

E: az 272.3 el 24.5 pa 42.6 f: az 100.0 el 56.5 pa -64.6 u,v (fr/asec) 9902.939 3849.499 simultaneous interpolator

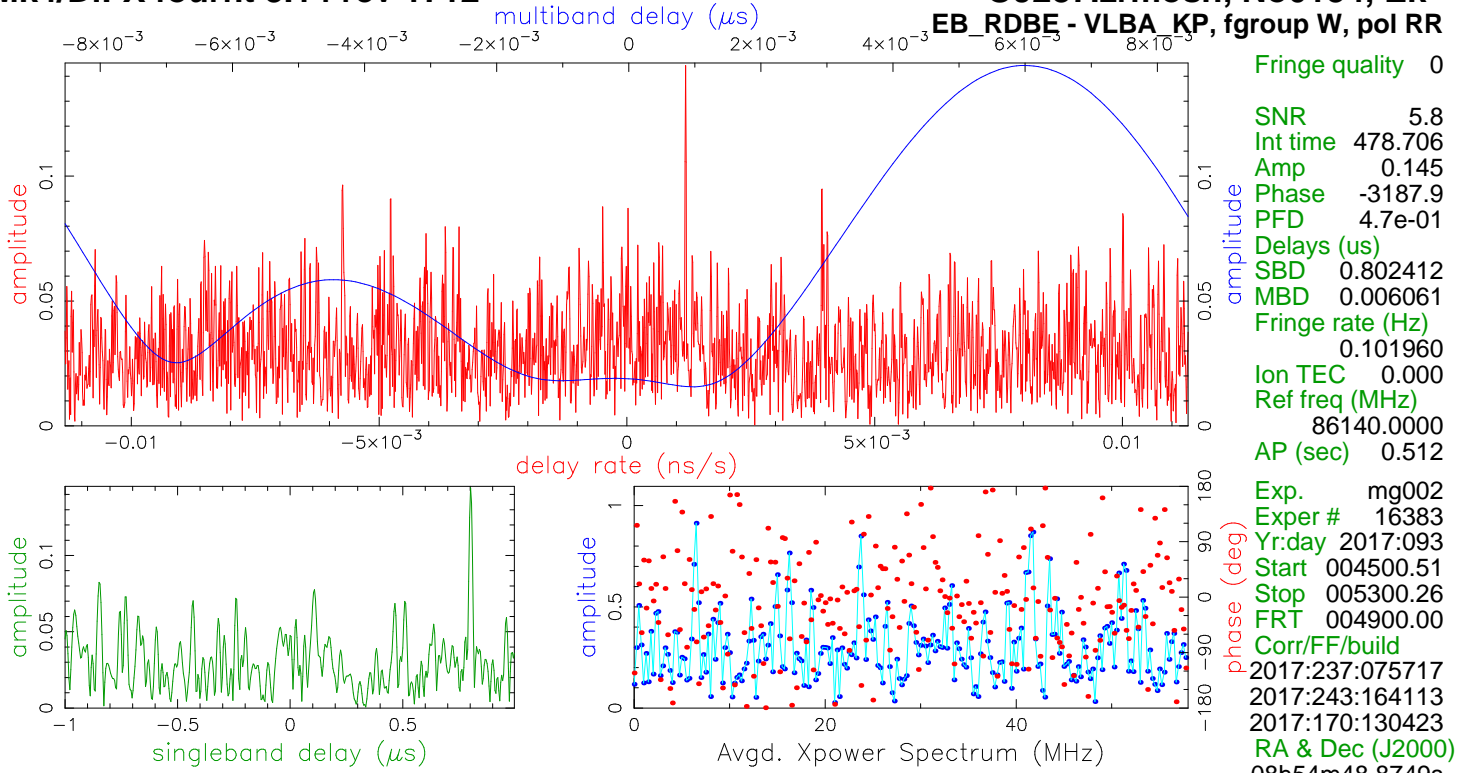
Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ef.zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ef.W.115.zrmosn



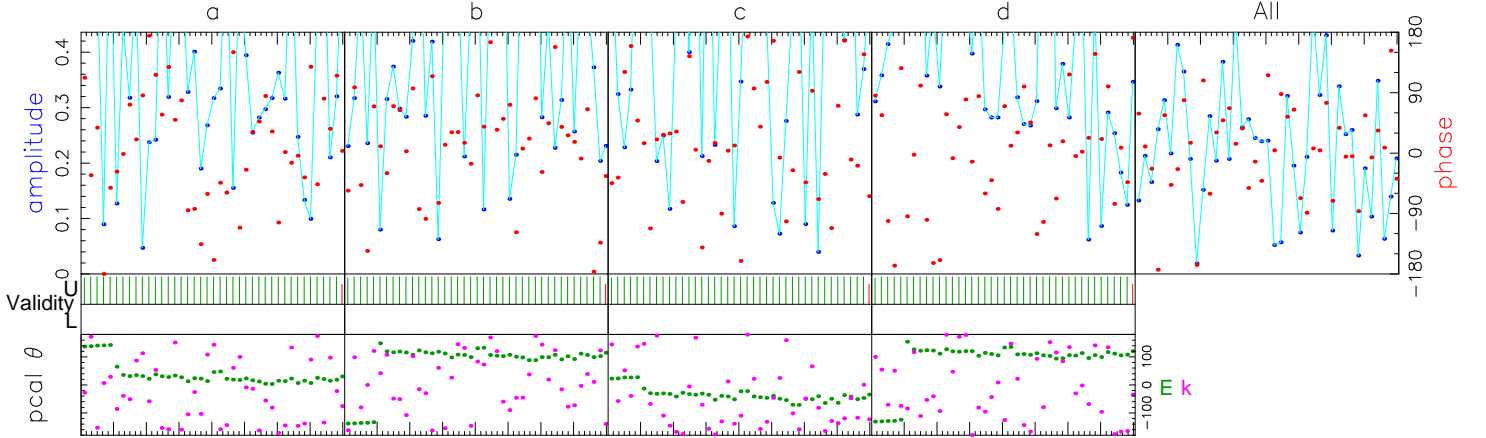
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	-88.9	-83.4	-74.2	-92.1	Phase	-84.5
	0.2	0.1	0.2	0.2	Ampl.	0.2
	329.3	105.1	427.7	430.3	Sbd box	429.0
U/L	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	
k	3890	296	1703	3109	PC freqs	
E:k	0:0	0:0	0:0	0:0	PC phase	
E:k	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
k	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
k	W00UL	W01UL	W02UL	W03UL	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	-7.94681407493E+03	Apriori delay (usec)	-7.94765567071E+03	Resid mbdelay (usec)	5.32912E-03	+/- 4.2E-04
Sband delay (usec)	-7.94681093030E+03	Apriori clock (usec)	3.1775827E+01	Resid sbdelay (usec)	8.44740E-01	+/- 1.7E-03
Phase delay (usec)	-7.94765567344E+03	Apriori clockrate (us/s)	6.1488019E-09	Resid phdelay (usec)	-2.72492E-06	+/- 6.5E-07
Delay rate (us/s)	-1.72836057293E+00	Apriori rate (us/s)	-1.72835174875E+00	Resid rate (us/s)	-8.82417E-06	+/- 2.3E-09
Total phase (deg)	-3600.2	Apriori accel (us/s/s)	5.18093673862E-05	Resid phase (deg)	-3429.0	+/- 20.0
RMS	62.5	Theor.	64.1	Amplitude	0.185 +/- 0.032	
ph/seg (deg)	62.5	64.1	Search (2048X16)	0.140	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5
amp/seg (%)	98.2	111.9	Interp.	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us) -1.000 1.000
ph/frq (deg)	9.6	20.0	Inc. seg. avg.	0.183	Bits/sample: 2x2	SampCntNorm: enabled
amp/frq (%)	22.3	34.9	Inc. frq. avg.	0.176	Sample rate(MSamp/s): 116	mb window (us) -0.009 0.009
					Data rate(Mb/s): 928	dr window (ns/s) -0.011 0.011
					nlags: 232	t_cohere infinite
						ion window (TEC) 0.00 0.00

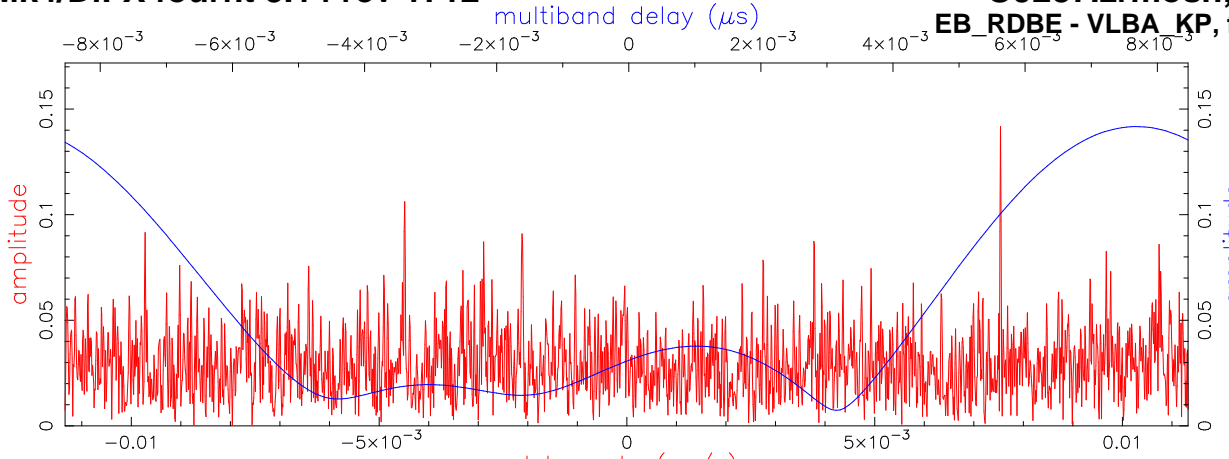


Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

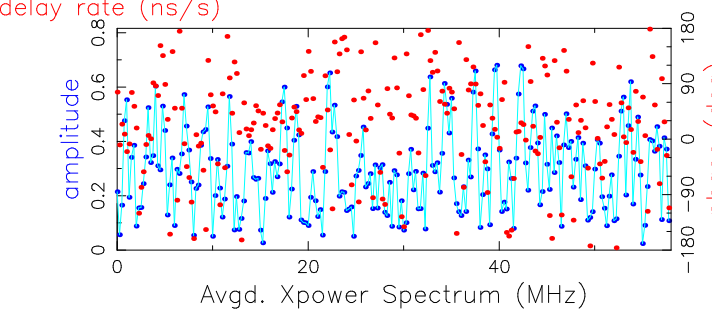
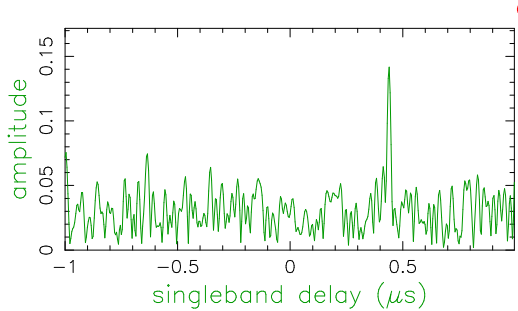


	86151.11	86209.70	86268.30	86326.89	86385.48	All
U/L	937/0	937/0	937/0	937/0	937/0	937/0
E	3890	296	1703	3109	3109	3109
k	3890	296	1703	3109	3109	3109
E:k	0:0	0:0	0:0	0:0	0:0	0:0
E:k	0:0	0:0	0:0	0:0	0:0	0:0
E	1000	1000	1000	1000	1000	1000
k	1000	1000	1000	1000	1000	1000
E	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR
k	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR
Group delay (usec)(sbd)	-7.94684747664E+03		Apriori delay (usec)	-7.94765567071E+03	Resid mbdelay (usec)	6.06074E-03 +/- 4.2E-04
Sband delay (usec)	-7.94685325913E+03		Apriori clock (usec)	3.1775827E+01	Resid sbdelay (usec)	8.02412E-01 +/- 1.6E-03
Phase delay (usec)	-7.94765567007E+03		Apriori clockrate (us/s)	6.1488019E-09	Resid phdelay (usec)	6.48103E-07 +/- 6.3E-07
Delay rate (us/s)	-1.72835056510E+00		Apriori rate (us/s)	-1.72835174875E+00	Resid rate (us/s)	1.18365E-06 +/- 2.3E-09
Total phase (deg)		-3359.1	Apriori accel (us/s/s)	5.18093673862E-05	Resid phase (deg)	-3187.9 +/- 19.7

ph/seg (deg) 67.2 63.0 Search (2048X16) 0.141 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 amp/seg (%) 100.6 109.9 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 ph/frq (deg) 16.9 19.7 Inc. seg. avg. 0.144 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 amp/frq (%) 27.2 34.3 Inc. frq. avg. 0.140 Sample rate(MSamp/s): 116 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite dr window (ns/s) -0.011 0.011
 E: az 272.3 el 24.5 pa 42.6 k: az 96.5 el 49.8 pa -63.7 u,v (fr/asec) 10624.798 3438.224 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ek..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ek.W.118.zrmosn

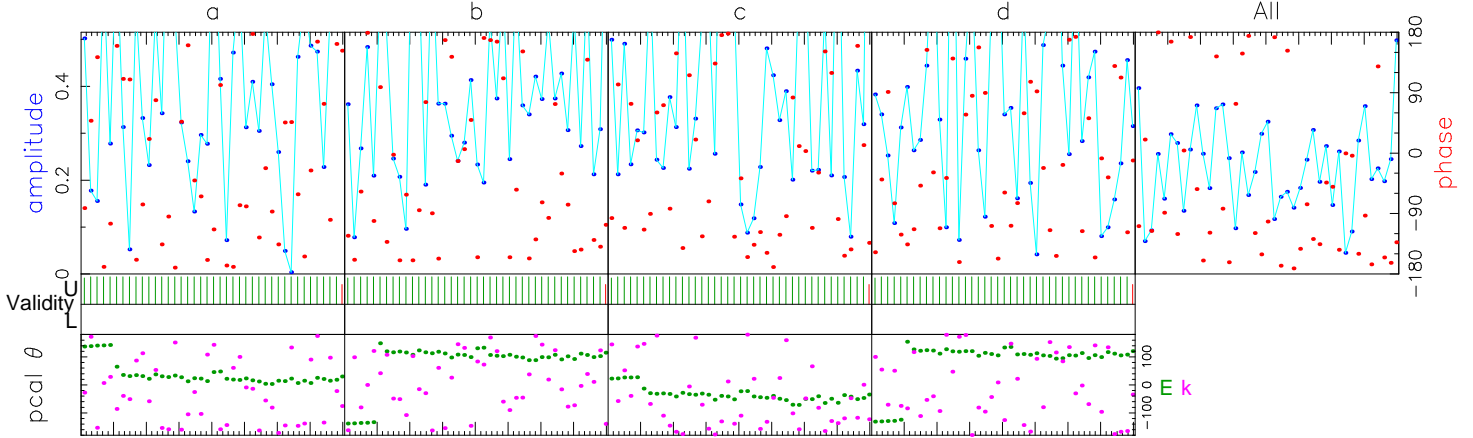


Fringe quality 0
 SNR 5.7
 Int time 478.712
 Amp 0.172
 Phase -1844.9
 PFD 6.8e-01
 Delays (us)
 SBD 0.438788
 MBD 0.007654
 Fringe rate (Hz)
 0.649183
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512



Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164114
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

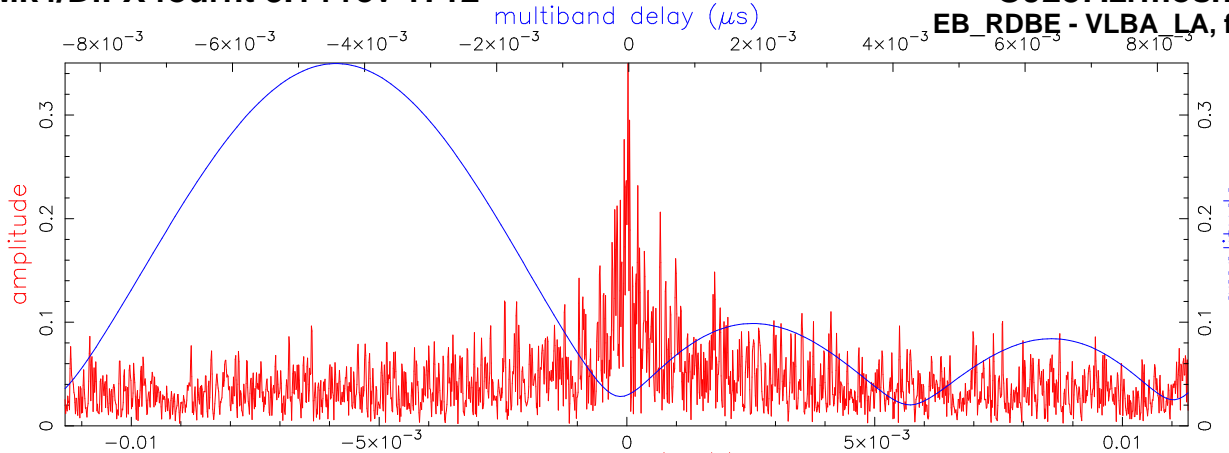


	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
UL	937/0	937/0	937/0	937/0	Phase	-138.5
E	3890	296	1703	3109	Ampl.	0.2
k	3890	296	1703	3109	Sbd box	334.8
E:k	0:0	0:0	0:0	0:0	APs used	
E:k	0:0	0:0	0:0	0:0	PC freqs	
E	1000	1000	1000	1000	PC phase	
k	1000	1000	1000	1000	ManI PC	
E	W00UL	W01UL	W02UL	W03UL	PC amp	
k	W00UR	W01UR	W02UR	W03UR	Chan ids	
					Tracks	
					Chan ids	
					Tracks	

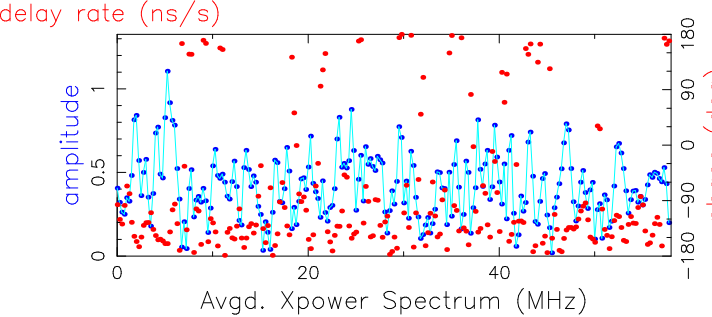
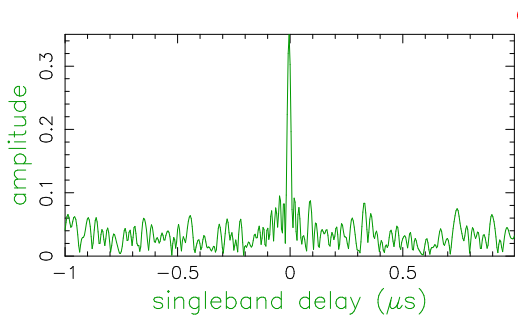
Group delay (usec)(sbd)	-7.94722134970E+03	Apriori delay (usec)	-7.94765567071E+03	Resid mbdelay (usec)	7.65435E-03	+/-	4.2E-04
Sband delay (usec)	-7.94721688285E+03	Apriori clock (usec)	3.1775827E+01	Resid sbdelay (usec)	4.38788E-01	+/-	1.7E-03
Phase delay (usec)	-7.94765567518E+03	Apriori clockrate (us/s)	6.1488019E-09	Resid phdelay (usec)	-4.46757E-06	+/-	6.5E-07
Delay rate (us/s)	-1.72834421238E+00	Apriori rate (us/s)	-1.72835174875E+00	Resid rate (us/s)	7.53637E-06	+/-	2.3E-09
Total phase (deg)	-2016.1	Apriori accel (us/s/s)	5.18093673862E-05	Resid phase (deg)	-1844.9	+/-	20.0

ph/seg (deg)	67.6	Theor.	64.0	Amplitude	0.172 +/- 0.030	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5
amp/seg (%)	89.2	Search (2048X16)	0.133	Search	0.133	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000
ph/frq (deg)	7.7	Inc. seg. avg.	0.170	Inc. seg. avg.	0.170	Bits/sample:	2x2	SampCntNorm:	enabled
amp/frq (%)	21.1	Inc. frq. avg.	0.162	Inc. frq. avg.	0.162	Sample rate (MSamp/s):	116	mb window (us)	-0.009 0.009

E: az 272.3 el 24.5 pa 42.6 k: az 96.5 el 49.8 pa -63.7 u,v (fr/asec) 10624.798 3438.224 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ek..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ek.W.119.zrmosn

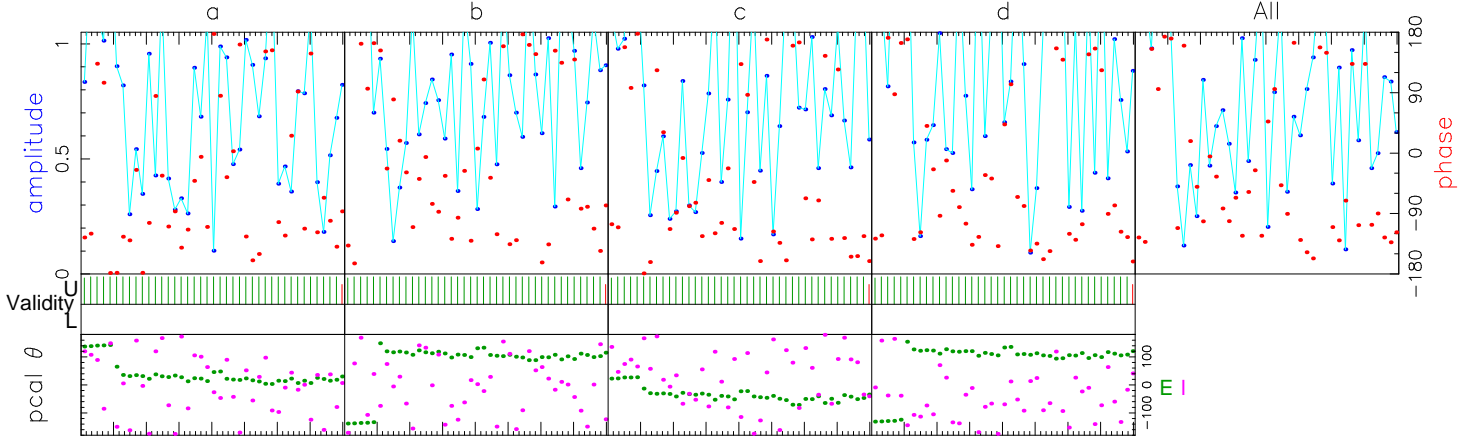


Fringe quality 9
 SNR 14.1
 Int time 478.715
 Amp 0.350
 Phase -142.3
 PFD 9.1e-37
 Delays (us)
 SBD -0.004831
 MBD -0.004428
 Fringe rate (Hz) 0.002161
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512



Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build 2017:237:075717
 2017:243:164120
 2017:170:130423
 RA & Dec (J2000) 08h54m48.8749s +20°06'30.641"

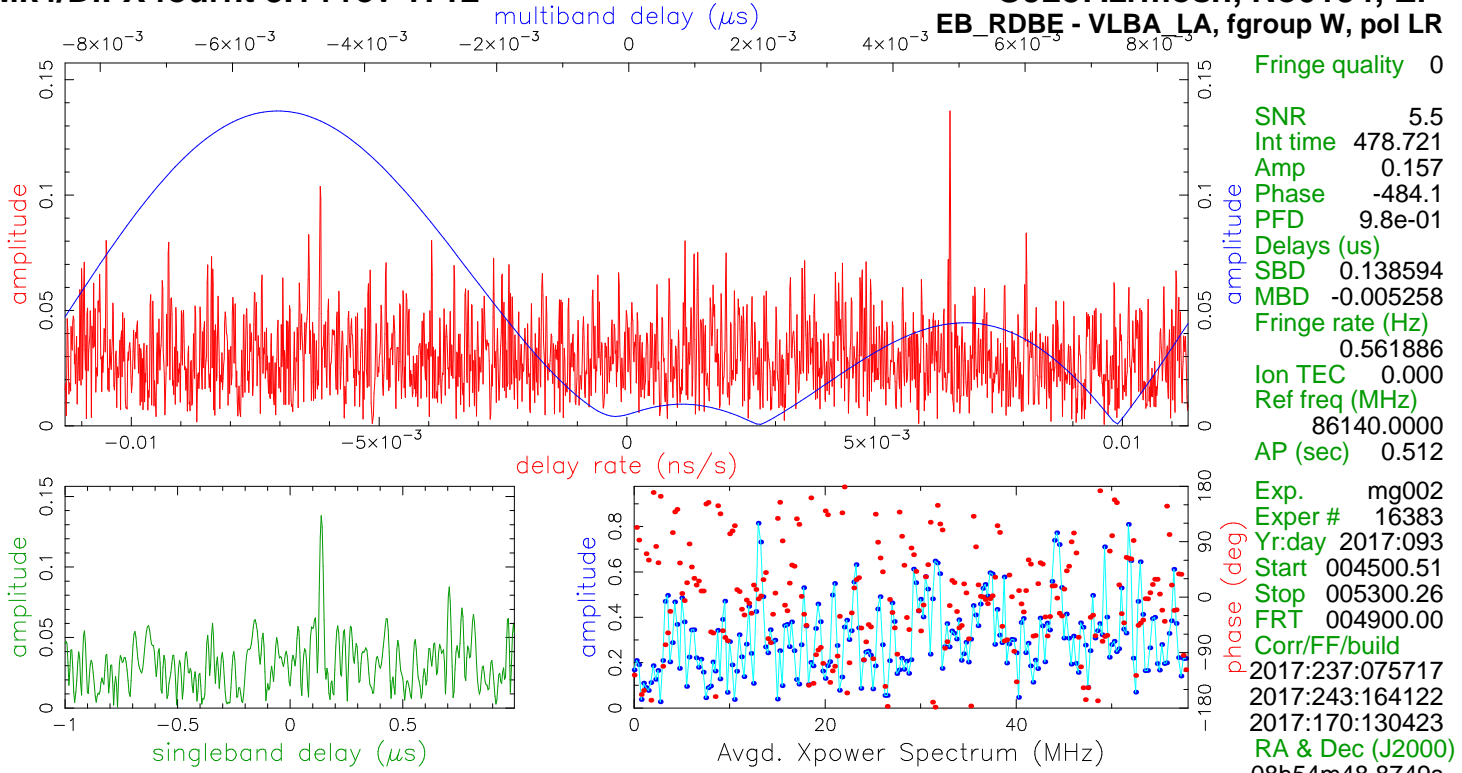
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



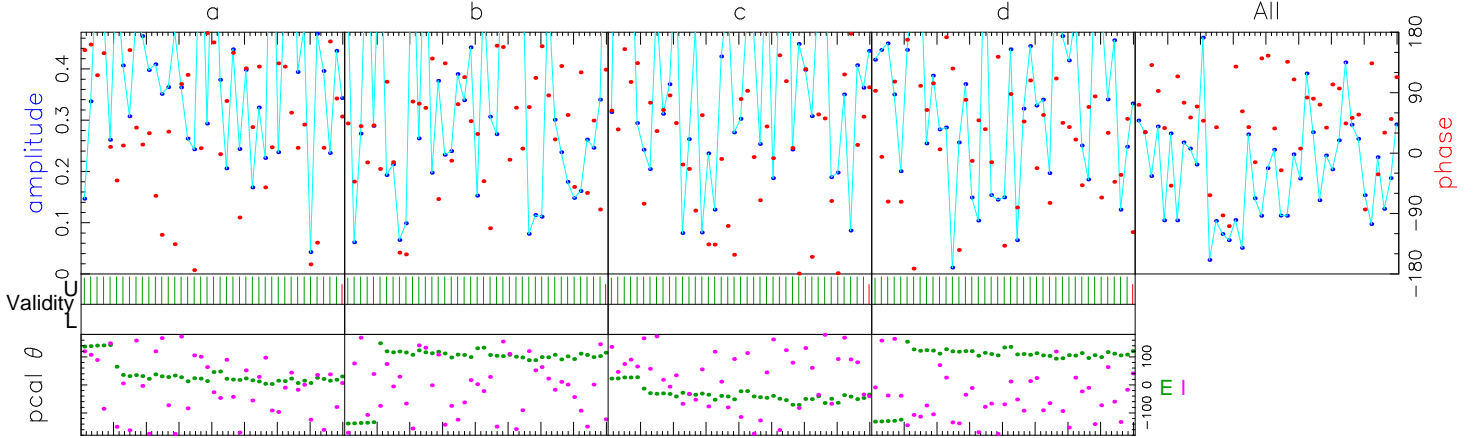
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	Phase	-142.3
I	3890	296	1703	3109	Ampl.	0.3
E:I	0:0	0:0	0:0	0:0	Sbd box	231.9
E:I	0:0	0:0	0:0	0:0	APs used	
E	1000	1000	1000	1000	PC freqs	
I	1000	1000	1000	1000	PC freqs	
E	W00UR	W01UR	W02UR	W03UR	PC phase	
I	W00UR	W01UR	W02UR	W03UR	Mani PC	
					PC amp	
					Chan ids	
					Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-8.75534734280E+03	Apriori delay (usec)	-8.75534291473E+03	Resid mbdelay (usec)	-4.42808E-03	+/-	1.7E-04
Sband delay (usec)	-8.75534774618E+03	Apriori clock (usec)	3.3055946E+01	Resid sbdelay (usec)	-4.83145E-03	+/-	6.7E-04
Phase delay (usec)	-8.75534291932E+03	Apriori clockrate (us/s)	1.0474273E-07	Resid phdelay (usec)	-4.58997E-06	+/-	2.6E-07
Delay rate (us/s)	-1.60635475644E+00	Apriori rate (us/s)	-1.60635478153E+00	Resid rate (us/s)	2.50879E-08	+/-	9.5E-10
Total phase (deg)		Apriori accel (us/s/s)	5.39727199649E-05	Resid phase (deg)	-142.3	+/-	8.1

ph/seg (deg)	73.7	RMS	26.0	Theor.	26.0	Amplitude	0.350 +/- 0.025	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5	sb window (us)	-1.000	1.000	
amp/seg (%)	154.5	Search (2048X16)	0.338	Interp.	0.000	Apriori clockrate (us/s)	1.0474273E-07	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	SampCntNorm:	enabled	mb window (us)	-0.009	0.009	
ph/frq (deg)	2.5	Inc. seg. avg.	0.689	Inc. seg. avg.	0.689	Apriori rate (us/s)	-1.60635478153E+00	Bits/sample:	2x2	dr window (ns/s)	-0.011	0.011	ion window (TEC)	0.00	0.00
amp/frq (%)	12.6	Inc. frq. avg.	0.346	Inc. frq. avg.	0.346	Apriori accel (us/s/s)	5.39727199649E-05	Sample rate(MSamp/s):	116	nlags:	232	t_cohere	infinite		

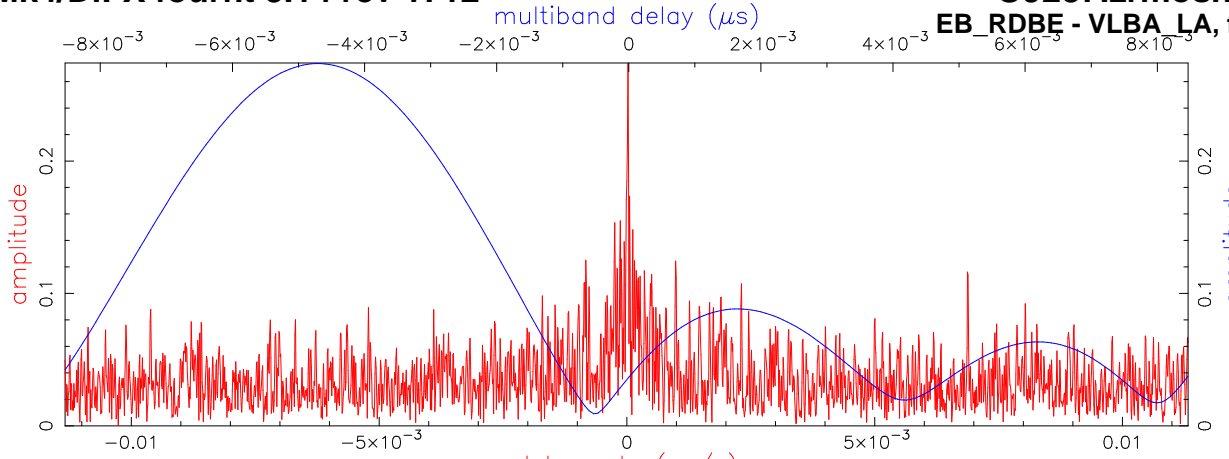


Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

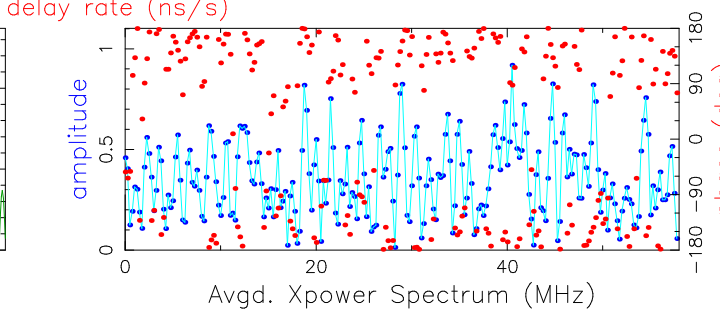
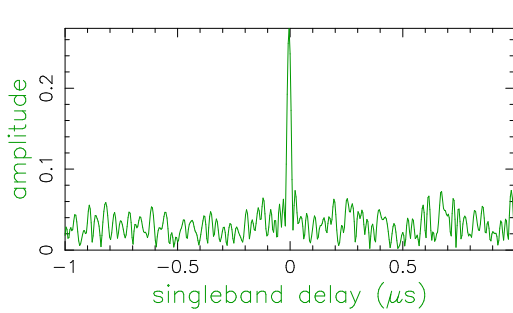


	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	APs used	
I	3890	296	1703	3109	PC freqs	
E:I	0:0	0:0	0:0	0:0	PC phase	
E:I	0:0	0:0	0:0	0:0	ManI PC	
E	1000	1000	1000	1000	PC amp	
I	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
I	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	-8.75521163903E+03		Apriori delay (usec)	-8.75534291473E+03	Resid mbdelay (usec)	-5.25764E-03 +/- 4.4E-04
Sband delay (usec)	-8.75520432080E+03		Apriori clock (usec)	3.3055946E+01	Resid sbdelay (usec)	1.38594E-01 +/- 1.7E-03
Phase delay (usec)	-8.75534291273E+03		Apriori clockrate (us/s)	1.0474273E-07	Resid phdelay (usec)	1.99761E-06 +/- 6.7E-07
Delay rate (us/s)	-1.60634825859E+00		Apriori rate (us/s)	-1.60635478153E+00	Resid rate (us/s)	6.52294E-06 +/- 2.4E-09
Total phase (deg)		-727.0	Apriori accel (us/s/s)	5.39727199649E-05	Resid phase (deg)	-484.1 +/- 20.8

	RMS	Theor.	Amplitude	0.157 +/- 0.029	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5
ph/seg (deg)	66.1	66.6	Search (2048X16)	0.131	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us) -1.000 1.000
amp/seg (%)	86.3	116.3	Interp.	0.000	Bits/sample: 2x2	SampCntNorm: enabled mb window (us) -0.009 0.009
ph/frq (deg)	14.1	20.8	Inc. seg. avg.	0.139	Sample rate(MSamp/s): 116	dr window (ns/s) -0.011 0.011
amp/frq (%)	13.3	36.3	Inc. frq. avg.	0.150	Data rate(Mb/s): 928	nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00

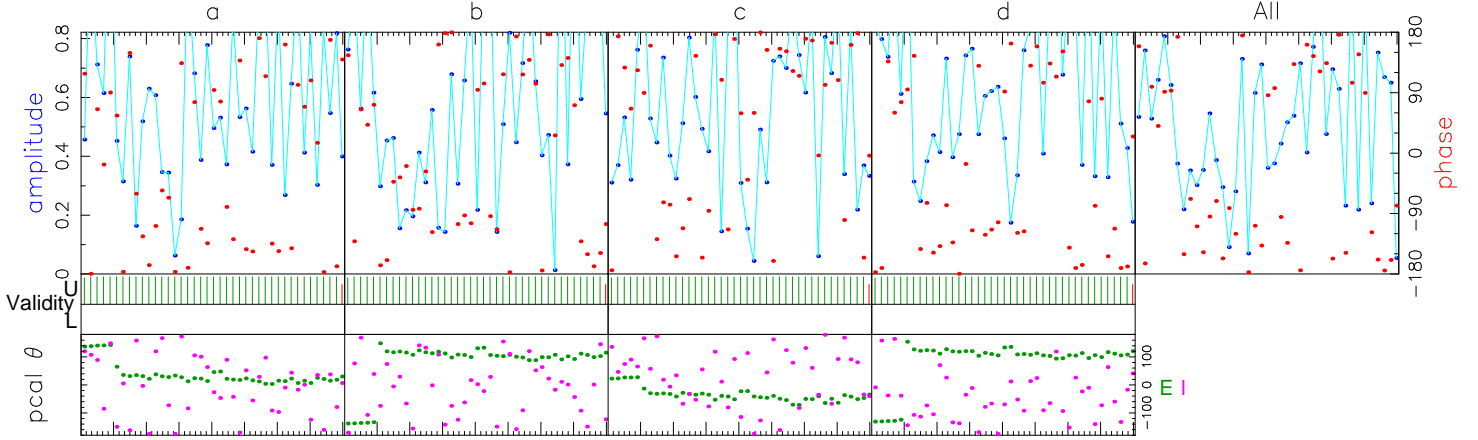


Fringe quality 9
 SNR 11.0
 Int time 478.716
 Amp 0.274
 Phase 168.5
 PFD 5.4e-20
 Delays (us)
 SBD -0.004888
 MBD -0.004718
 Fringe rate (Hz) 0.001957
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build 2017:237:075717
 2017:243:164123
 2017:170:130423
 RA & Dec (J2000) 08h54m48.8749s +20°06'30.641"



Avgd. Xpower Spectrum (MHz)

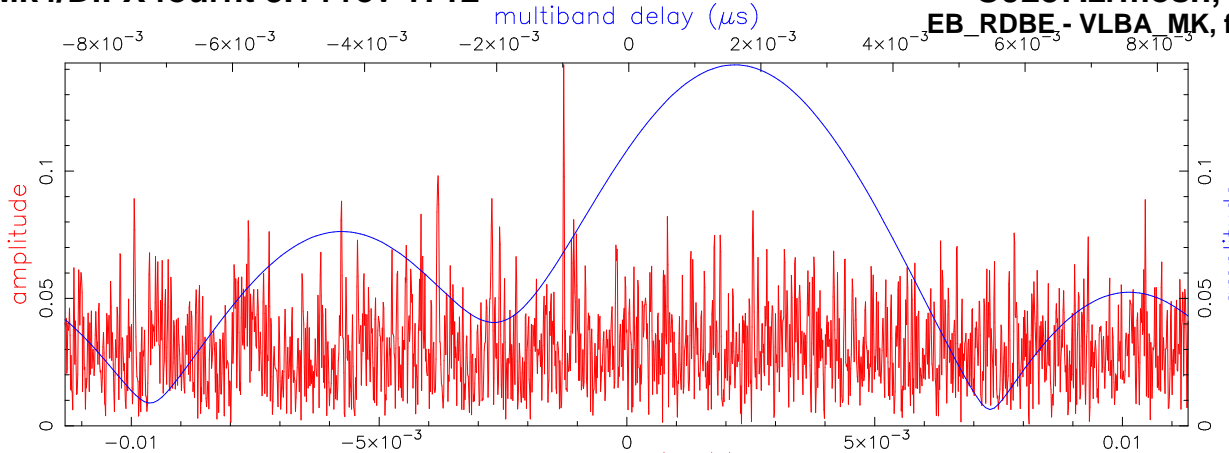
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



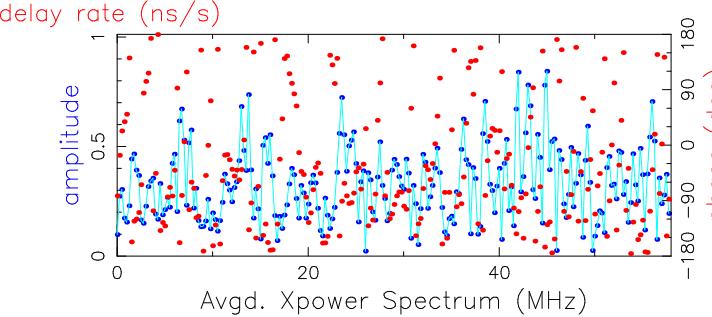
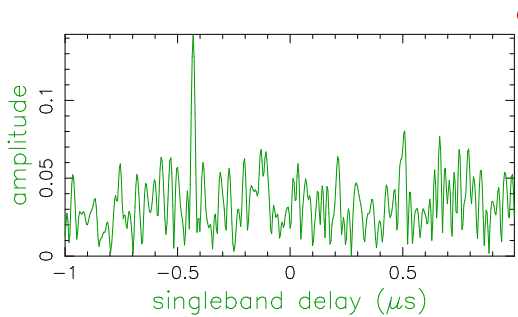
	86151.11	86209.70	86268.30	86326.89	86326.89	86326.89	86326.89	86326.89	All
U/L	937/0	937/0	937/0	937/0	937/0	937/0	937/0	937/0	937/0
E	3890	296	1703	3109	3109	3109	3109	3109	3109
I	3890	296	1703	3109	3109	3109	3109	3109	3109
E:I	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0
E:I	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0	0:0
E	1000	1000	1000	1000	1000	1000	1000	1000	1000
I	1000	1000	1000	1000	1000	1000	1000	1000	1000
E	W00UR	W01UR	W02UR	W03UR	W03UR	W03UR	W03UR	W03UR	W03UR
I	W00UL	W01UL	W02UL	W03UL	W03UL	W03UL	W03UL	W03UL	W03UL

Group delay (usec)(sbd)	-8.75534763246E+03	Apriori delay (usec)	-8.75534291473E+03	Resid mbdelay (usec)	-4.71773E-03	+/-	2.2E-04
Sband delay (usec)	-8.75534780273E+03	Apriori clock (usec)	3.3055946E+01	Resid sbdelay (usec)	-4.88800E-03	+/-	8.6E-04
Phase delay (usec)	-8.75534290929E+03	Apriori clockrate (us/s)	1.0474273E-07	Resid phdelay (usec)	5.43517E-06	+/-	3.3E-07
Delay rate (us/s)	-1.60635475881E+00	Apriori rate (us/s)	-1.60635478153E+00	Resid rate (us/s)	2.27220E-08	+/-	1.2E-09
Total phase (deg)	-74.3	Apriori accel (us/s/s)	5.39727199649E-05	Resid phase (deg)	168.5	+/-	10.4

ph/seg (deg)	65.2	Theor.	33.2	Amplitude	0.274 +/- 0.025	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5
amp/seg (%)	128.0	Search (2048X16)	0.268	Search	0.268	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000
ph/frq (deg)	6.6	Interp.	0.000	Apriori clockrate	0.445	Bits/sample:	2x2	SampCntNorm:	enabled
amp/frq (%)	9.4	Inc. seg. avg.	0.270	Apriori rate	0.270	Sample rate(MSamp/s):	116	mb window (us)	-0.009 0.009
		Inc. frq. avg.	0.270	Apriori accel	0.270	Data rate(Mb/s):	928	dr window (ns/s)	-0.011 0.011
								ion window (TEC)	0.00 0.00

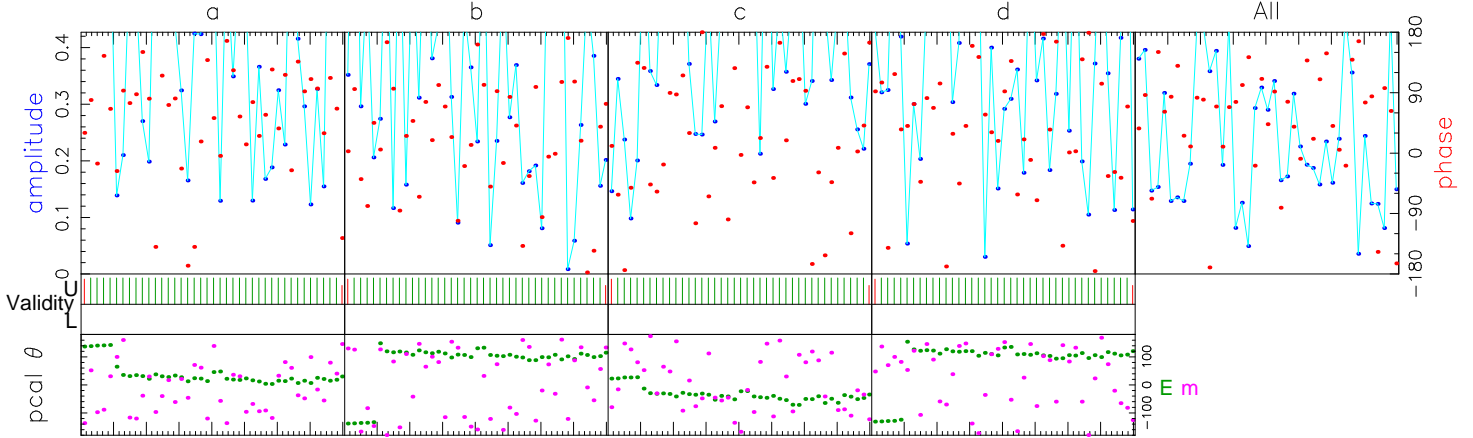


Fringe quality 0
 SNR 5.6
 Int time 458.369
 Amp 0.142
 Phase 1775.1
 PFD 9.2e-01
 Delays (us)
 SBD -0.431055
 MBD 0.001607
 Fringe rate (Hz)
 -0.110016
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512



Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164128
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

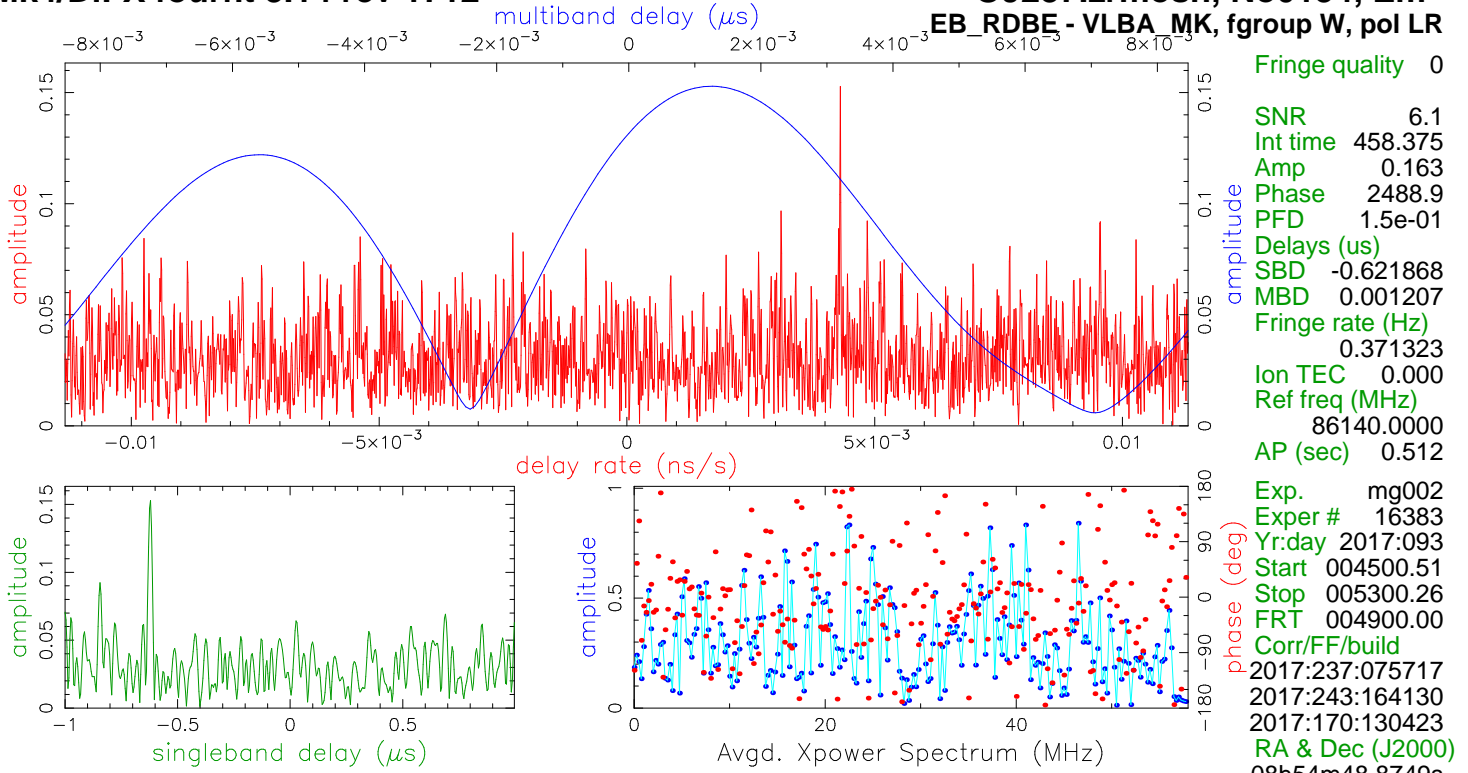


	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	APs used	
m	3890	296	1703	3109	PC freqs	133.0
E:m	0:0	0:0	0:0	0:0	PC phase	
E:m	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
m	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
m	W00UR	W01UR	W02UR	W03UR	Tracks	

Group delay (usec)(sbd)	4.65429136371E+03	Apriori delay (usec)	4.65471642377E+03	Resid mbdelay (usec)	1.60661E-03	+/- 4.4E-04
Sband delay (usec)	4.65428536860E+03	Apriori clock (usec)	2.9739775E+01	Resid sbdelay (usec)	-4.31055E-01	+/- 1.7E-03
Phase delay (usec)	4.65471642598E+03	Apriori clockrate (us/s)	6.6869734E-08	Resid phdelay (usec)	2.21400E-06	+/- 6.6E-07
Delay rate (us/s)	-2.27232434062E+00	Apriori rate (us/s)	-2.27232306344E+00	Resid rate (us/s)	-1.27718E-06	+/- 2.4E-09
Total phase (deg)	2042.7	Apriori accel (us/s/s)	-7.85993612702E-06	Resid phase (deg)	1775.1	+/- 20.5

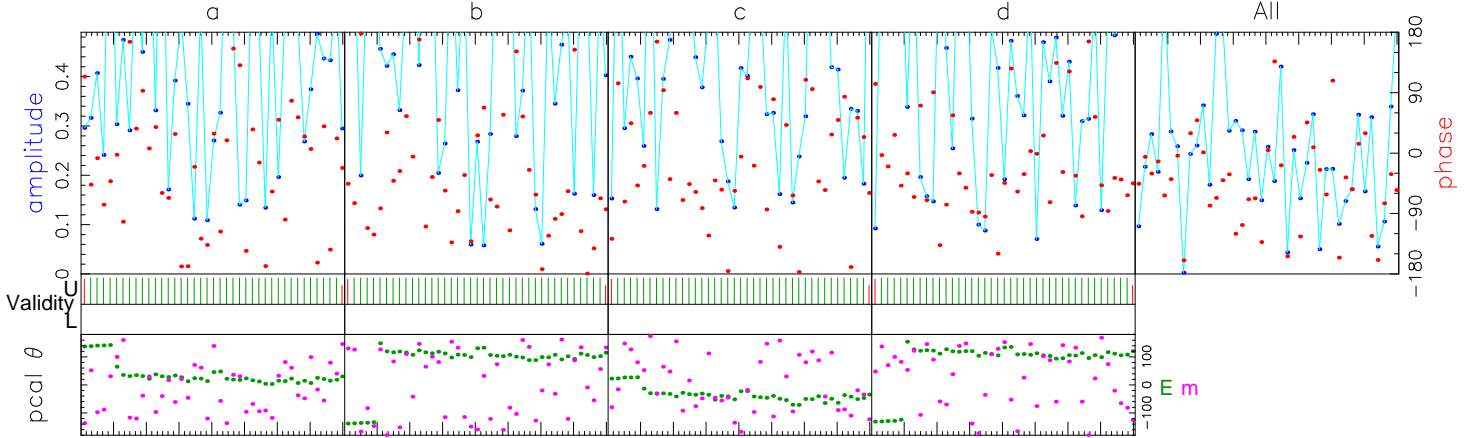
ph/seg (deg)	65.9	Theor.	65.7	Search (2048X16)	0.134	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
amp/seg (%)	110.6		114.6	Interp.	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	SampCntNorm: enabled	mb window (us)	-0.009	0.009
ph/frq (deg)	16.6		20.5	Inc. seg. avg.	0.146	Bits/sample: 2x2		dr window (ns/s)	-0.011	0.011
amp/frq (%)	32.4		35.8	Inc. frq. avg.	0.137	Sample rate(MSamp/s): 116		ion window (TEC)	0.00	0.00

E: az 272.3 el 24.5 pa 42.6 m: az 72.0 el 9.5 pa -72.2 u,v (fr/asec) 13831.674 3290.214 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Em..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Em.W.126.zrmosn



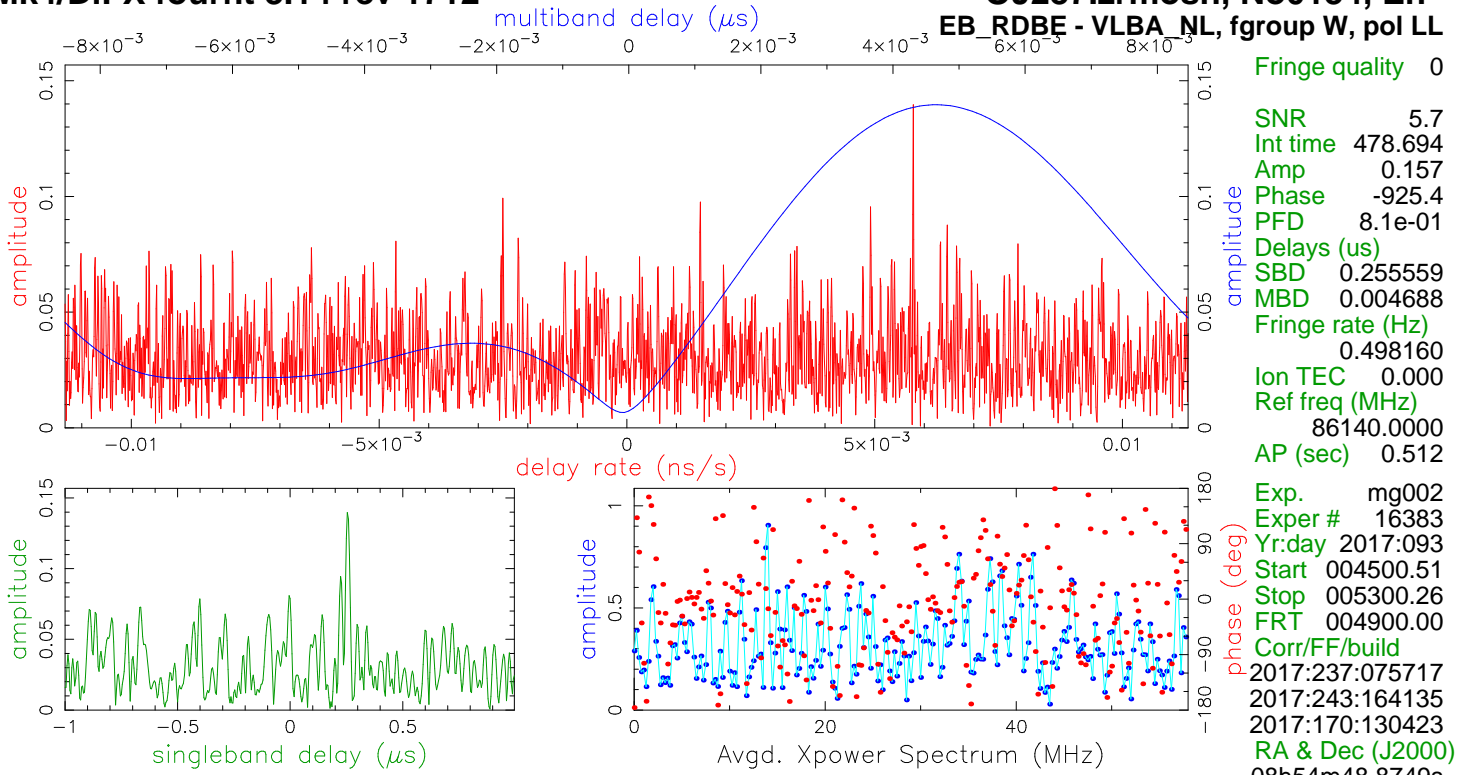
Fringe quality 0
 SNR 6.1
 Int time 458.375
 Amp 0.163
 Phase 2488.9
 PFD 1.5e-01
 Delays (us)
 SBD -0.621868
 MBD 0.001207
 Fringe rate (Hz) 0.371323
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build 2017:237:075717
 2017:243:164130
 2017:170:130423
 RA & Dec (J2000) 08h54m48.8749s +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

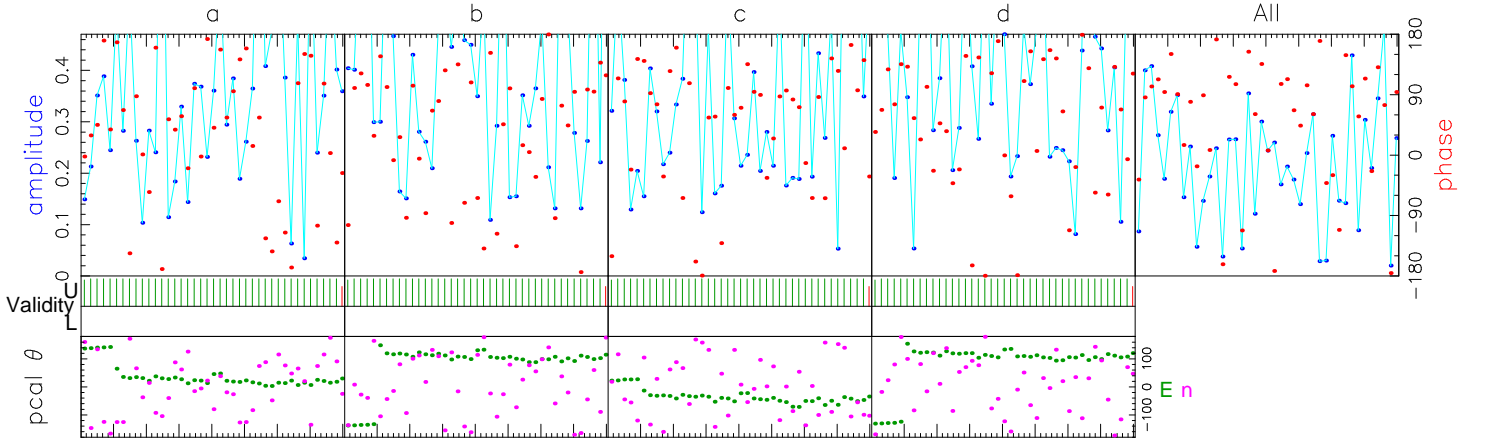


	86151.11	86209.70	86268.30	86326.89	86385.48	All
86151.11	86209.70	86268.30	86326.89	86385.48	86444.07	All
UL	937/0	937/0	937/0	937/0	937/0	937/0
E	3890	296	1703	3109	3109	3109
m	3890	296	1703	3109	3109	3109
E:m	0:0	0:0	0:0	0:0	0:0	0:0
E:m	0:0	0:0	0:0	0:0	0:0	0:0
F	1000	1000	1000	1000	1000	1000
m	1000	1000	1000	1000	1000	1000
E	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL
m	W00UR	W01UR	W02UR	W03UR	W04UR	W05UR
Group delay (usec)(sbd)	4.65408616456E+03	4.65409455618E+03	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03
Sband delay (usec)	4.65409455618E+03	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03
Phase delay (usec)	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03	4.65471642377E+03
Delay rate (us/s)	-2.27231875275E+00	-2.27231875275E+00	-2.27231875275E+00	-2.27231875275E+00	-2.27231875275E+00	-2.27231875275E+00
Total phase (deg)		2756.6				
Apriori delay (usec)			0.144			
Apriori clock (usec)			0.144			
Apriori clockrate (us/s)			0.000			
Apriori rate (us/s)			0.180			
Apriori accel (us/s/s)			0.180			
Resid mbdelay (usec)			1.20745E-03			
Resid sbdelay (usec)			-6.21868E-01			
Resid phdelay (usec)			-1.17788E-06			
Resid rate (us/s)			4.31069E-06			
Resid phase (deg)			2488.9			
Pcal mode:	MANUAL	MANUAL	MANUAL	MANUAL	MANUAL	MANUAL
Pcal rate:	0.000E+00	0.000E+00	0.000E+00	0.000E+00	0.000E+00	0.000E+00
PC period (AP's)	5	5	5	5	5	5
sb window (us)	-1.000	1.000	-1.000	1.000	-1.000	1.000
mb window (us)	-0.009	0.009	-0.009	0.009	-0.009	0.009
dr window (ns/s)	-0.011	0.011	-0.011	0.011	-0.011	0.011
ion window (TEC)	0.00	0.00	0.00	0.00	0.00	0.00

ph/seg (deg) 68.4 60.5 Search (2048X16) 0.144 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 amp/seg (%) 102.7 105.6 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 ph/frq (deg) 45.3 18.9 Inc. seg. avg. 0.167 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 amp/frq (%) 34.3 33.0 Inc. frq. avg. 0.180 Sample rate(MSamp/s): 116 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite dr window (ns/s) -0.011 0.011
 E: az 272.3 el 24.5 pa 42.6 m: az 72.0 el 9.5 pa -72.2 u,v (fr/asec) 13831.674 3290.214 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Em..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Em.W.127.zrmosn



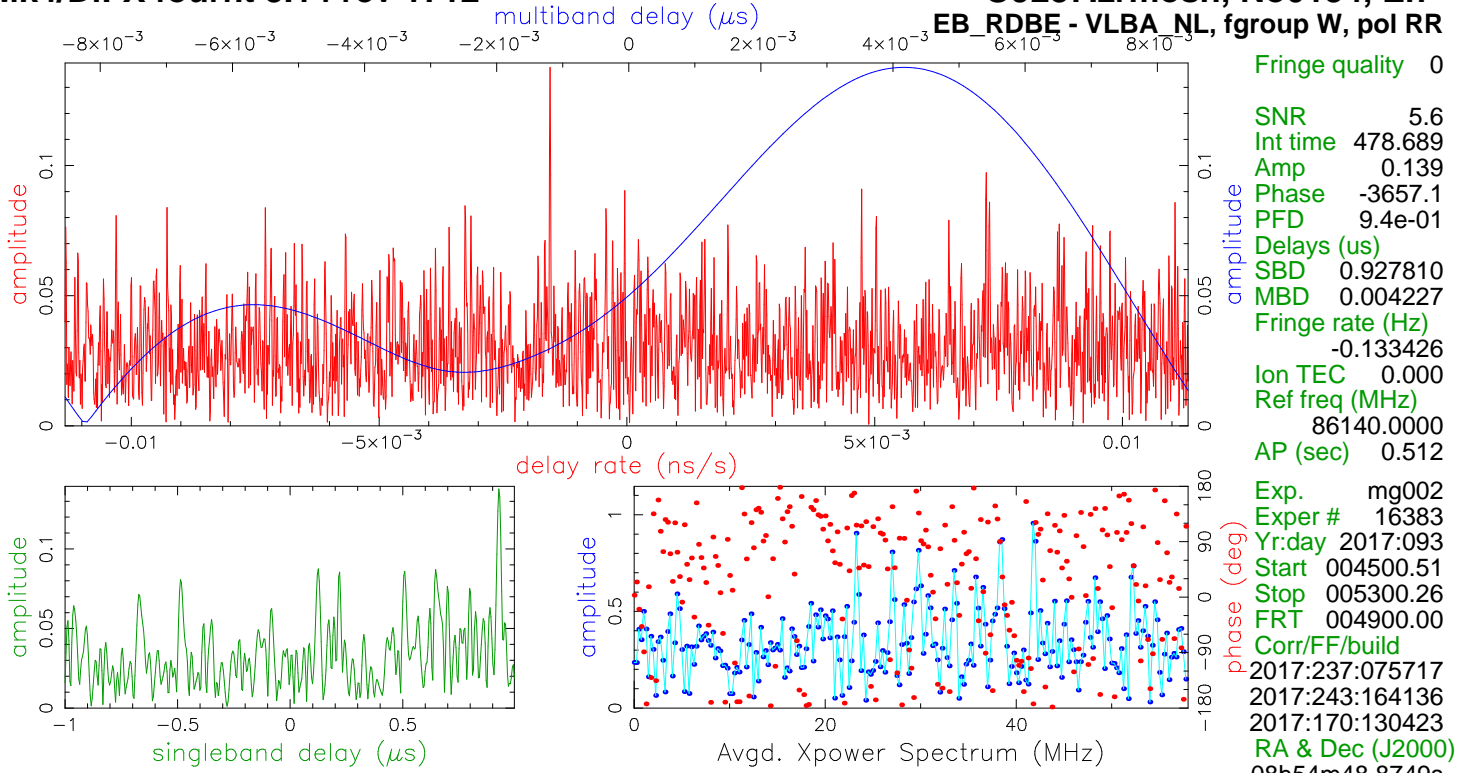
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



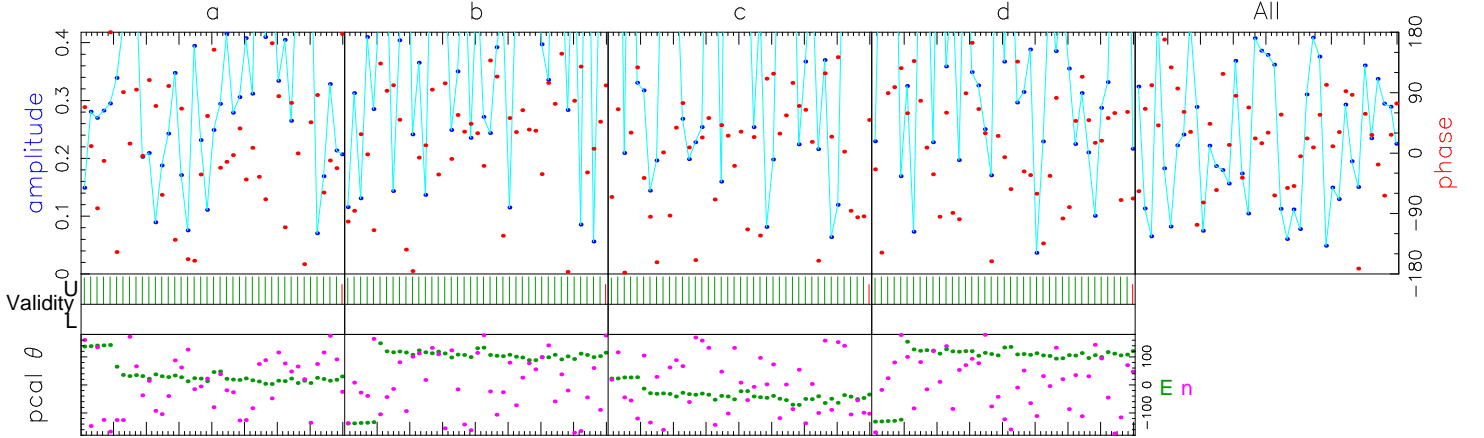
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
UL	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	APs used	
n	3890	296	1703	3109	PC freqs	
E:n	0:0	0:0	0:0	0:0	PC phase	
E:n	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
n	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
n	W00UL	W01UL	W02UL	W03UL	Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-1.01537049743E+04	Apriori delay (usec)	-1.01539656626E+04	Resid mbdelay (usec)	4.68831E-03	+/- 4.3E-04
Sband delay (usec)	-1.01537101035E+04	Apriori clock (usec)	2.3312687E+01	Resid sbdelay (usec)	2.55559E-01	+/- 1.7E-03
Phase delay (usec)	-1.01539656595E+04	Apriori clockrate (us/s)	-2.9281688E-07	Resid phdelay (usec)	3.17602E-06	+/- 6.5E-07
Delay rate (us/s)	-1.30665146037E+00	Apriori rate (us/s)	-1.30665724351E+00	Resid rate (us/s)	5.78314E-06	+/- 2.4E-09
Total phase (deg)	-989.7	Apriori accel (us/s/s)	5.82111962085E-05	Resid phase (deg)	-925.4	+/- 20.2

ph/seg (deg)	RMS 71.4	Theor. 64.8	Amplitude Search (2048X16) 0.157 +/- 0.028	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5
amp/seg (%)	100.8	113.1	Interp. 0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us) -1.000 1.000
ph/frq (deg)	16.6	20.2	Inc. seg. avg. 0.150	Bits/sample: 2x2	SampCntNorm: enabled
amp/frq (%)	30.4	35.3	Inc. frq. avg. 0.149	Sample rate(MSamp/s): 116	mb window (us) -0.009 0.009
				Data rate(Mb/s): 928	dr window (ns/s) -0.011 0.011
				nlags: 232	ion window (TEC) 0.00 0.00
				t_cohere infinite	



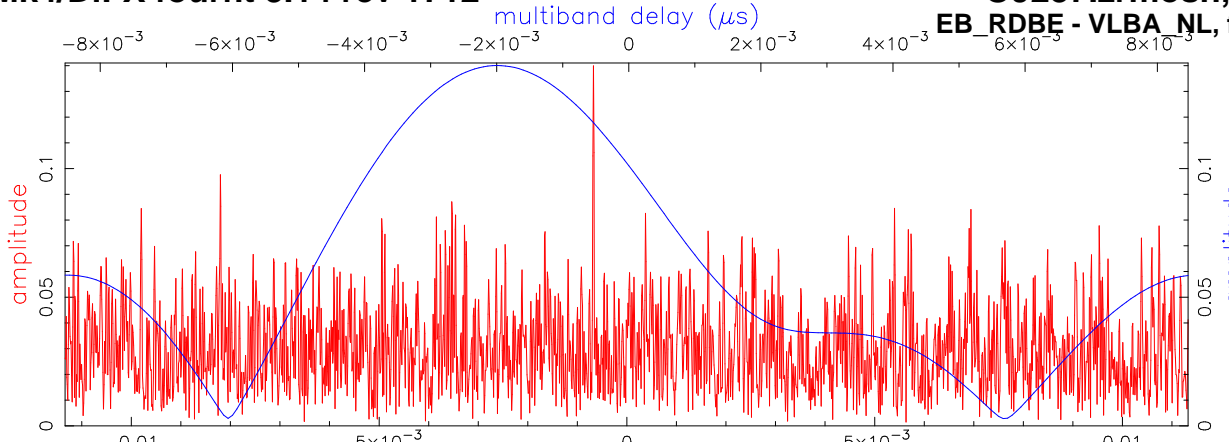
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



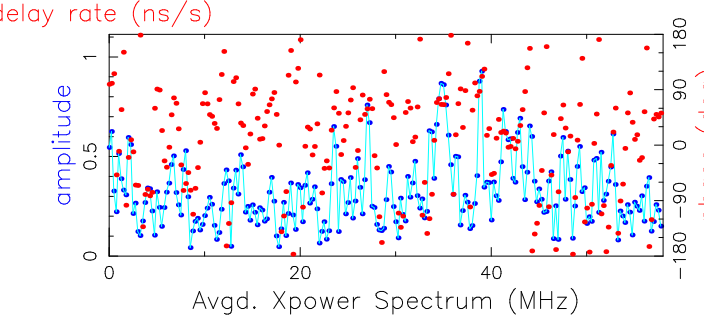
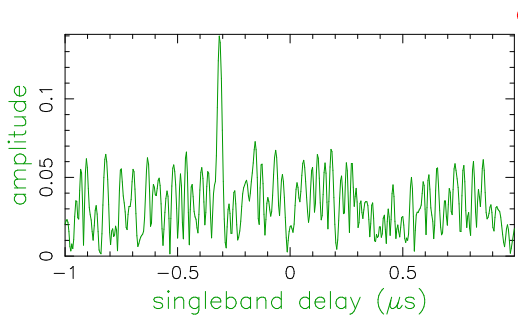
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	APs used	
n	3890	296	1703	3109	PC freqs	448.3
E:n	0:0	0:0	0:0	0:0	PC phase	
E:n	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
n	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
n	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	-1.01530398360E+04		Apriori delay (usec)	-1.01539656626E+04	Resid mbdelay (usec)	4.22662E-03 +/- 4.4E-04
Sband delay (usec)	-1.01530378521E+04		Apriori clock (usec)	2.3312687E+01	Resid sbdelay (usec)	9.27810E-01 +/- 1.7E-03
Phase delay (usec)	-1.01539656617E+04		Apriori clockrate (us/s)	-2.9281688E-07	Resid phdelay (usec)	9.25931E-07 +/- 6.6E-07
Delay rate (us/s)	-1.30665879246E+00		Apriori rate (us/s)	-1.30665724351E+00	Resid rate (us/s)	-1.54895E-06 +/- 2.4E-09
Total phase (deg)		-3721.5	Apriori accel (us/s/s)	5.82111962085E-05	Resid phase (deg)	-3657.1 +/- 20.6

RMS Theor. Amplitude 0.139 +/- 0.025 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 ph/seg (deg) 66.1 65.9 Search (2048X16) 0.135 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 amp/seg (%) 110.3 114.9 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 ph/frq (deg) 25.4 20.6 Inc. seg. avg. 0.142 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011
 amp/frq (%) 32.9 35.9 Inc. frq. avg. 0.137 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00

E: az 272.3 el 24.5 pa 42.6 n: az 131.2 el 60.8 pa -36.0 u,v (fr/asec) 8067.354 2499.660 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/En..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/En.W.130.zrmosn

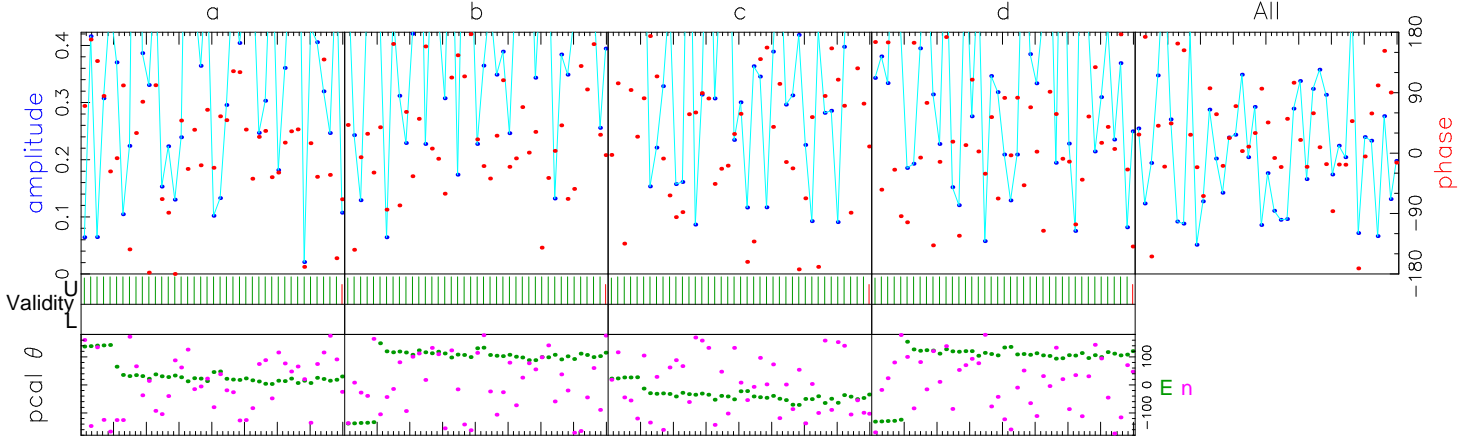


Fringe quality 0
 SNR 5.7
 Int time 478.694
 Amp 0.141
 Phase 1256.4
 PFD 7.9e-01
 Delays (us)
 SBD -0.313396
 MBD -0.001893
 Fringe rate (Hz)
 -0.058148
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512



Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164138
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

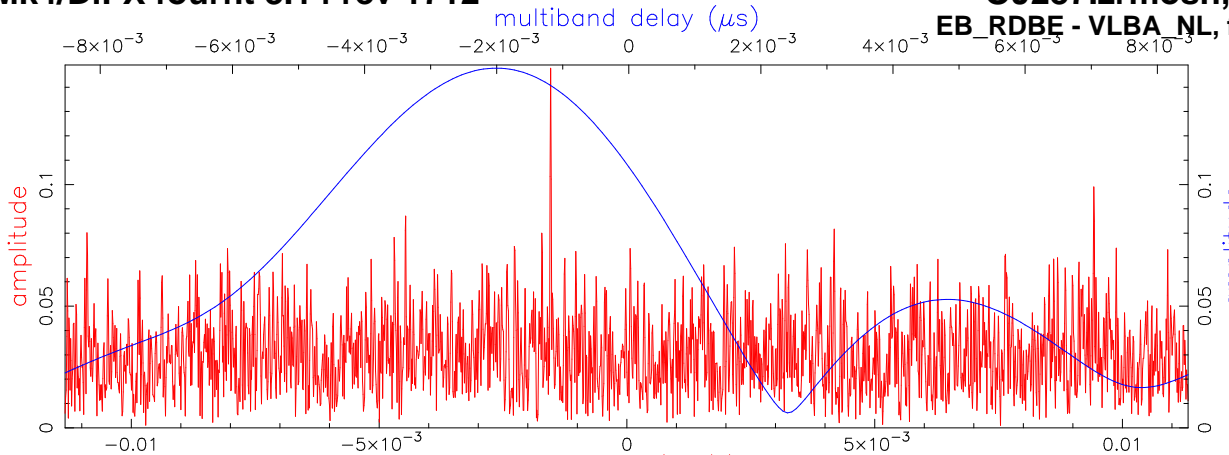
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



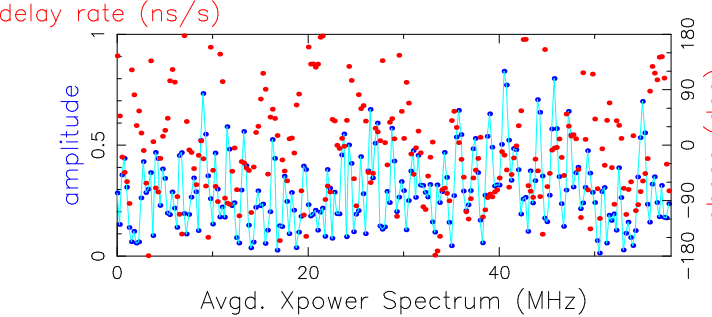
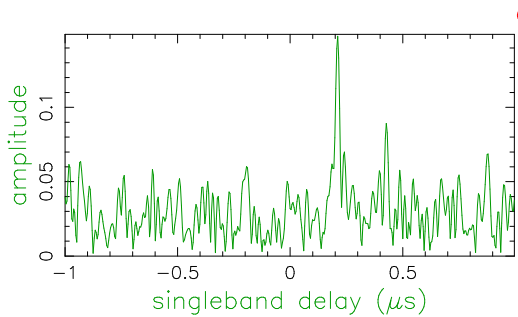
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
UL	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	27.8
n	3890	296	1703	3109	PC freqs	0.1
E:n	0:0	0:0	0:0	0:0	PC phase	160.3
E:n	0:0	0:0	0:0	0:0	Manl PC	
E	1000	1000	1000	1000	PC amp	
n	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
n	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-1.01542747554E+04	Apriori delay (usec)	-1.01539656626E+04	Resid mbdelay (usec)	-1.89281E-03	+/-	4.3E-04
Sband delay (usec)	-1.01542790588E+04	Apriori clock (usec)	2.3312687E+01	Resid sbdelay (usec)	-3.13396E-01	+/-	1.7E-03
Phase delay (usec)	-1.01539656617E+04	Apriori clockrate (us/s)	-2.9281688E-07	Resid phdelay (usec)	8.96073E-07	+/-	6.5E-07
Delay rate (us/s)	-1.30665791855E+00	Apriori rate (us/s)	-1.30665724351E+00	Resid rate (us/s)	-6.75040E-07	+/-	2.4E-09
Total phase (deg)	1192.0	Apriori accel (us/s/s)	5.82111962085E-05	Resid phase (deg)	1256.4	+/-	20.2

ph/seg (deg)	RMS 70.6	Theor. 64.7	Amplitude Search (2048X16)	0.141 +/- 0.025	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000
amp/seg (%)	100.2	112.9	Interp.	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)		mb window (us)	-0.009	0.009
ph/frq (deg)	24.3	20.2	Inc. seg. avg.	0.136	Bits/sample: 2x2	SampCntNorm: enabled	dr window (ns/s)	-0.011	0.011
amp/frq (%)	17.5	35.3	Inc. frq. avg.	0.137	Sample rate(MSamp/s): 116		ion window (TEC)	0.00	0.00
					Data rate(Mb/s): 928	nlags: 232	t_cohere	infinite	

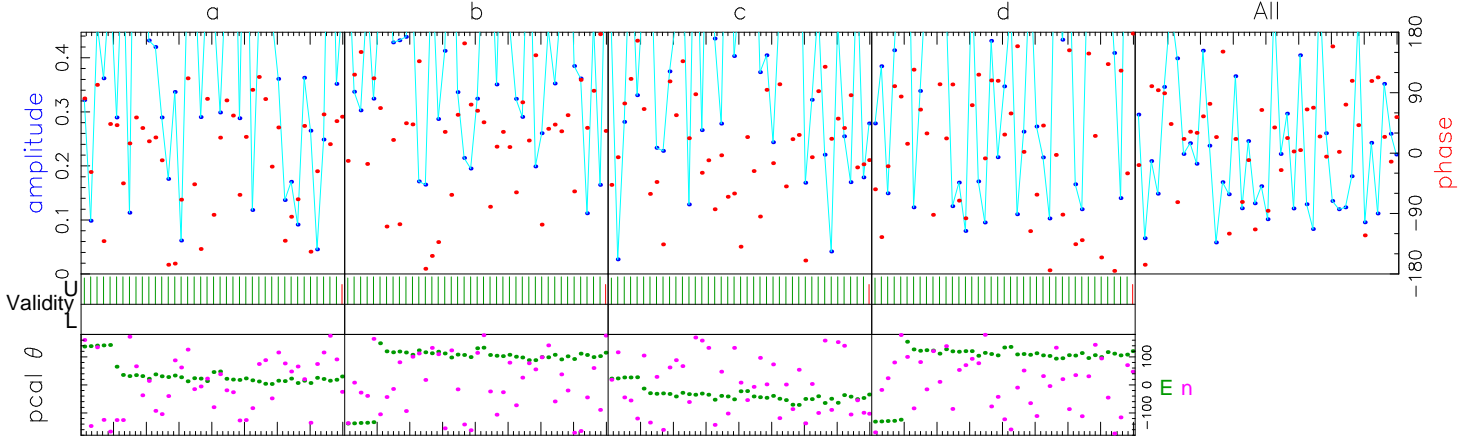


Fringe quality 0
 SNR 6.0
 Int time 478.688
 Amp 0.149
 Phase -786.9
 PFD 2.5e-01
 Delays (us)
 SBD 0.210663
 MBD -0.002013
 Fringe rate (Hz)
 -0.132495
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512



Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164139
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

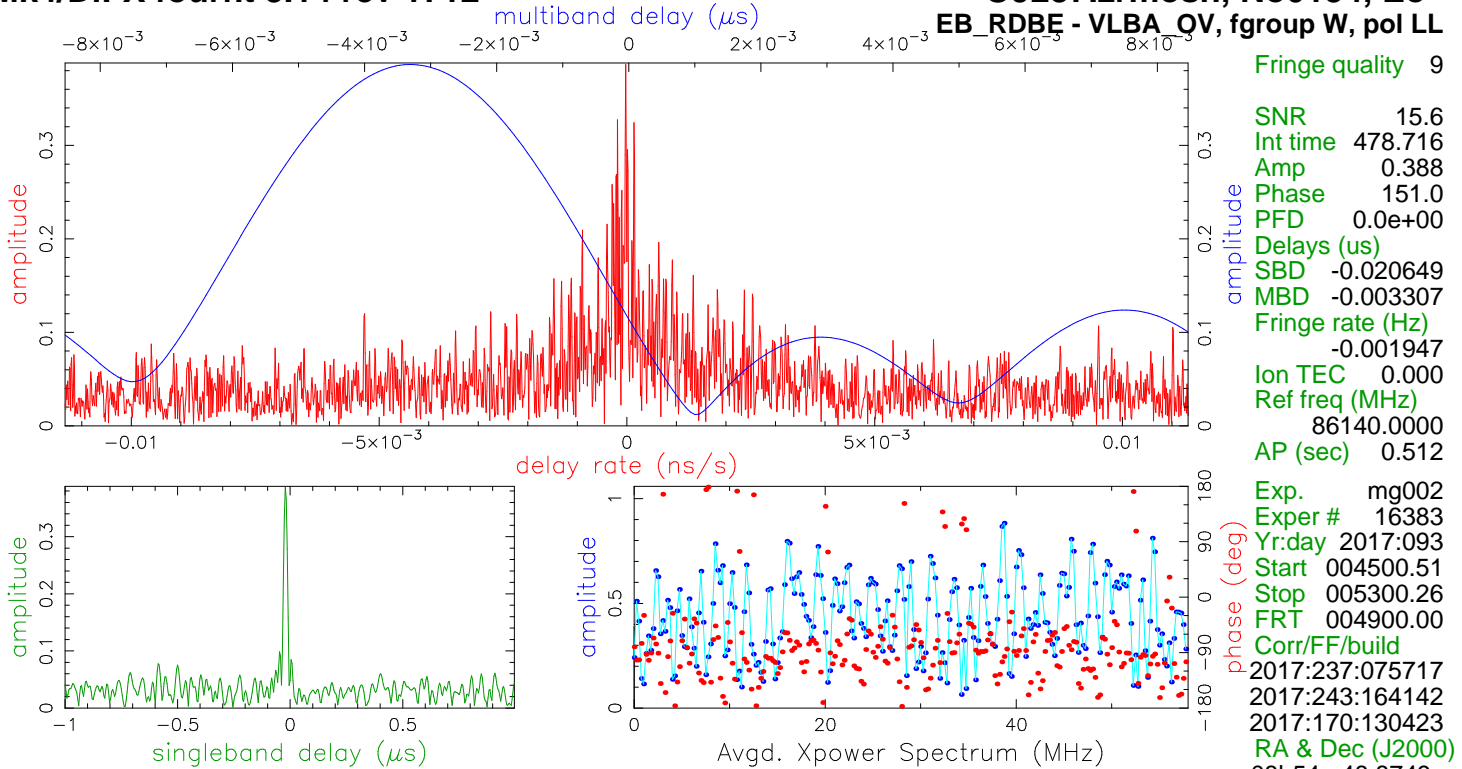
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



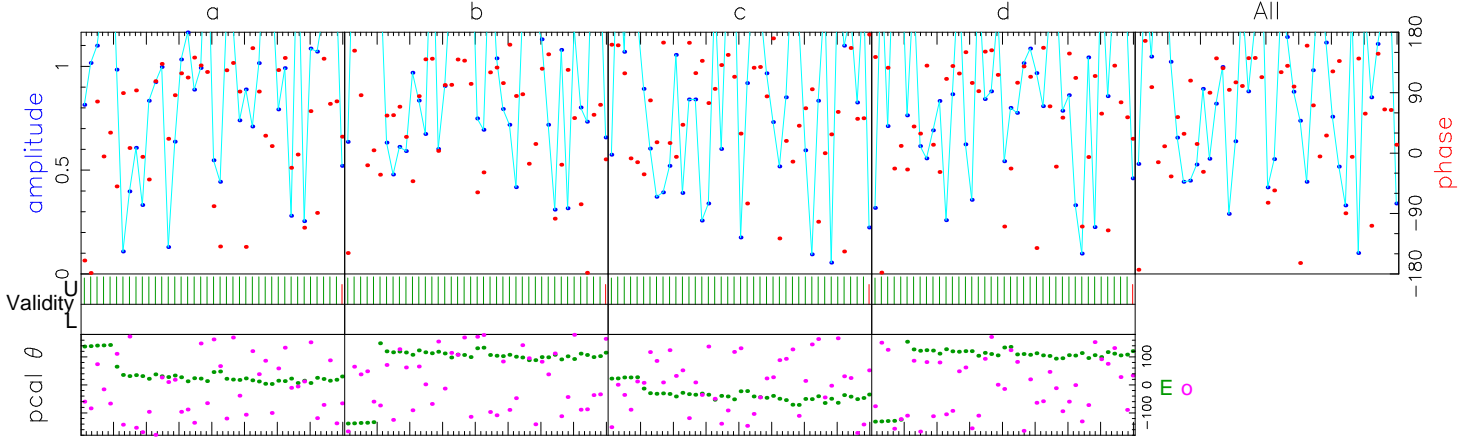
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
UL	937/0	937/0	937/0	937/0	APs used	32.2
E	3890	296	1703	3109	PC freqs	0.1
n	3890	296	1703	3109	PC freqs	281.9
E:n	0:0	0:0	0:0	0:0	PC phase	
E:n	0:0	0:0	0:0	0:0	Manl PC	
E	1000	1000	1000	1000	PC amp	
n	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
n	W00UL	W01UL	W02UL	W03UL	Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-1.01537628757E+04	Apriori delay (usec)	-1.01539656626E+04	Resid mbdelay (usec)	-2.01311E-03	+/-	4.1E-04
Sband delay (usec)	-1.01537550000E+04	Apriori clock (usec)	2.3312687E+01	Resid sbdelay (usec)	2.10663E-01	+/-	1.6E-03
Phase delay (usec)	-1.01539656616E+04	Apriori clockrate (us/s)	-2.9281688E-07	Resid phdelay (usec)	1.03702E-06	+/-	6.2E-07
Delay rate (us/s)	-1.30665878165E+00	Apriori rate (us/s)	-1.30665724351E+00	Resid rate (us/s)	-1.53814E-06	+/-	2.2E-09
Total phase (deg)	-851.3	Apriori accel (us/s/s)	5.82111962085E-05	Resid phase (deg)	-786.9	+/-	19.2

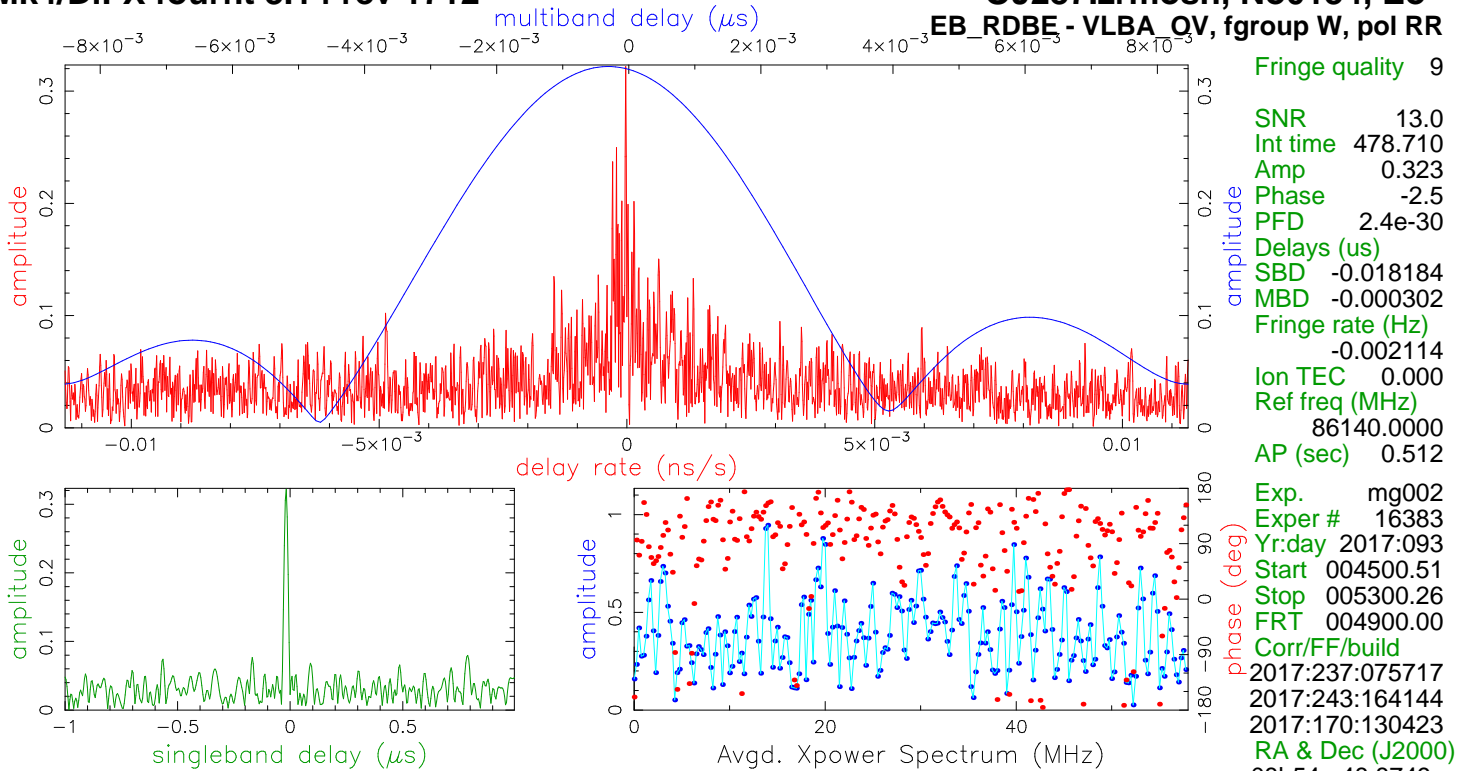
ph/seg (deg)	72.1	Theor.	61.5	Amplitude	0.149 +/- 0.025	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5
amp/seg (%)	105.8	Search (2048X16)	0.144	Search	0.000	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000
ph/frq (deg)	23.7	Interp.	0.000	Interp.	0.000	Bits/sample:	2x2	SampCntNorm:	enabled
amp/frq (%)	32.6	Inc. seg. avg.	0.151	Inc. seg. avg.	0.151	Sample rate(MSamp/s):	116	mb window (us)	-0.009 0.009
		Inc. frq. avg.	0.145	Inc. frq. avg.	0.145	Data rate(Mb/s):	928	dr window (ns/s)	-0.011 0.011
						nlags:	232	ion window (TEC)	0.00 0.00



Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

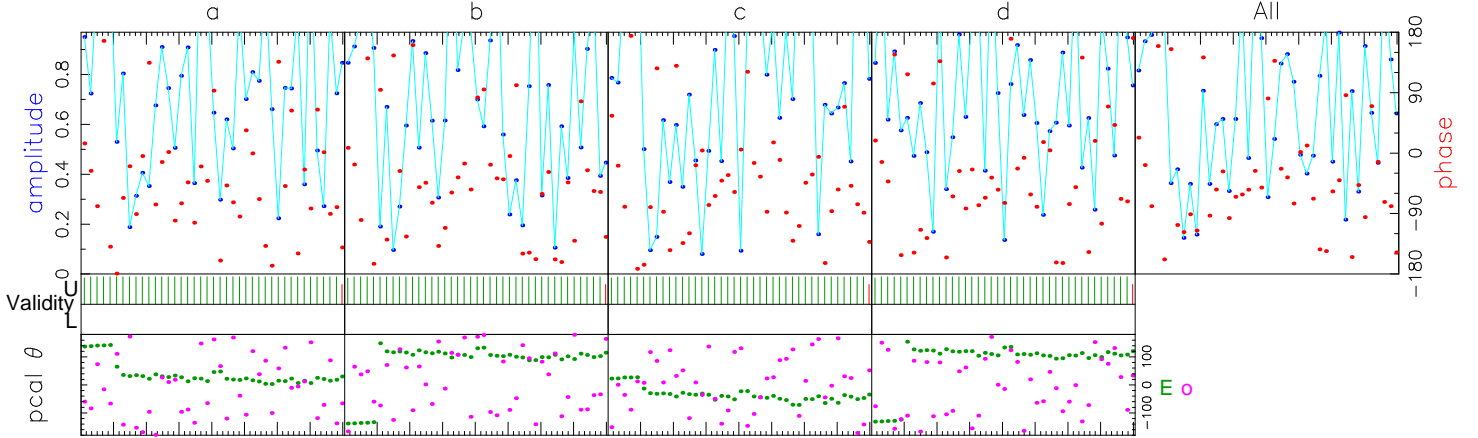


	86151.11	86209.70	86268.30	86326.89	86385.48	All
Group delay (usec)(sbd)	-6.41301098915E+03	-6.41301126409E+03	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03
Sband delay (usec)	-6.41301126409E+03	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03
Phase delay (usec)	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03	-6.41299061260E+03
Delay rate (us/s)	-1.77307137093E+00	-1.77307137093E+00	-1.77307137093E+00	-1.77307137093E+00	-1.77307137093E+00	-1.77307137093E+00
Total phase (deg)		-64.7				
U/L	937/0	937/0	937/0	937/0	937/0	937/0
E	3890	296	1703	3109	3109	3109
o	3890	296	1703	3109	3109	3109
E:o	0:0	0:0	0:0	0:0	0:0	0:0
E:o	0:0	0:0	0:0	0:0	0:0	0:0
E	1000	1000	1000	1000	1000	1000
o	1000	1000	1000	1000	1000	1000
E	W00UL	W01UL	W02UL	W03UL	W03UL	W03UL
o	W00UL	W01UL	W02UL	W03UL	W03UL	W03UL
pcal mode	MANUAL	MANUAL	MANUAL	MANUAL	MANUAL	MANUAL
pcal rate	0.000E+00	0.000E+00	0.000E+00	0.000E+00	0.000E+00	0.000E+00
Bits/sample	2x2	2x2	2x2	2x2	2x2	2x2
Sample rate (MSamp/s)	116	116	116	116	116	116
Data rate (Mb/s)	928	928	928	928	928	928
Resid mbdelay (usec)	-3.30722E-03	-3.30722E-03	-3.30722E-03	-3.30722E-03	-3.30722E-03	-3.30722E-03
Resid sbdelay (usec)	-2.06488E-02	-2.06488E-02	-2.06488E-02	-2.06488E-02	-2.06488E-02	-2.06488E-02
Resid phdelay (usec)	2.66677E-06	2.66677E-06	2.66677E-06	2.66677E-06	2.66677E-06	2.66677E-06
Resid rate (us/s)	-2.26023E-08	-2.26023E-08	-2.26023E-08	-2.26023E-08	-2.26023E-08	-2.26023E-08
Resid phase (deg)	151.0	151.0	151.0	151.0	151.0	151.0
Apriori delay (usec)						
Apriori clock (usec)						
Apriori clockrate (us/s)						
Apriori rate (us/s)						
Apriori accel (us/s/s)						
Search (2048X16)	0.386	0.386	0.386	0.386	0.386	0.386
Interp.	0.000	0.000	0.000	0.000	0.000	0.000
Inc. seg. avg.	0.838	0.838	0.838	0.838	0.838	0.838
Inc. frq. avg.	0.384	0.384	0.384	0.384	0.384	0.384
PCal period (AP's)	5	5	5	5	5	5
sb window (us)	-1.000	-1.000	-1.000	-1.000	-1.000	-1.000
mb window (us)	-0.009	-0.009	-0.009	-0.009	-0.009	-0.009
dr window (ns/s)	-0.011	-0.011	-0.011	-0.011	-0.011	-0.011
ion window (TEC)	0.00	0.00	0.00	0.00	0.00	0.00
simultaneous interpolator						



Fringe quality 9
 SNR 13.0
 Int time 478.710
 Amp 0.323
 Phase -2.5
 PFD 2.4e-30
 Delays (us)
 SBD -0.018184
 MBD -0.000302
 Fringe rate (Hz)
 -0.002114
 Ion TEC 0.000
 Ref freq (MHz)
 86140.000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164144
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

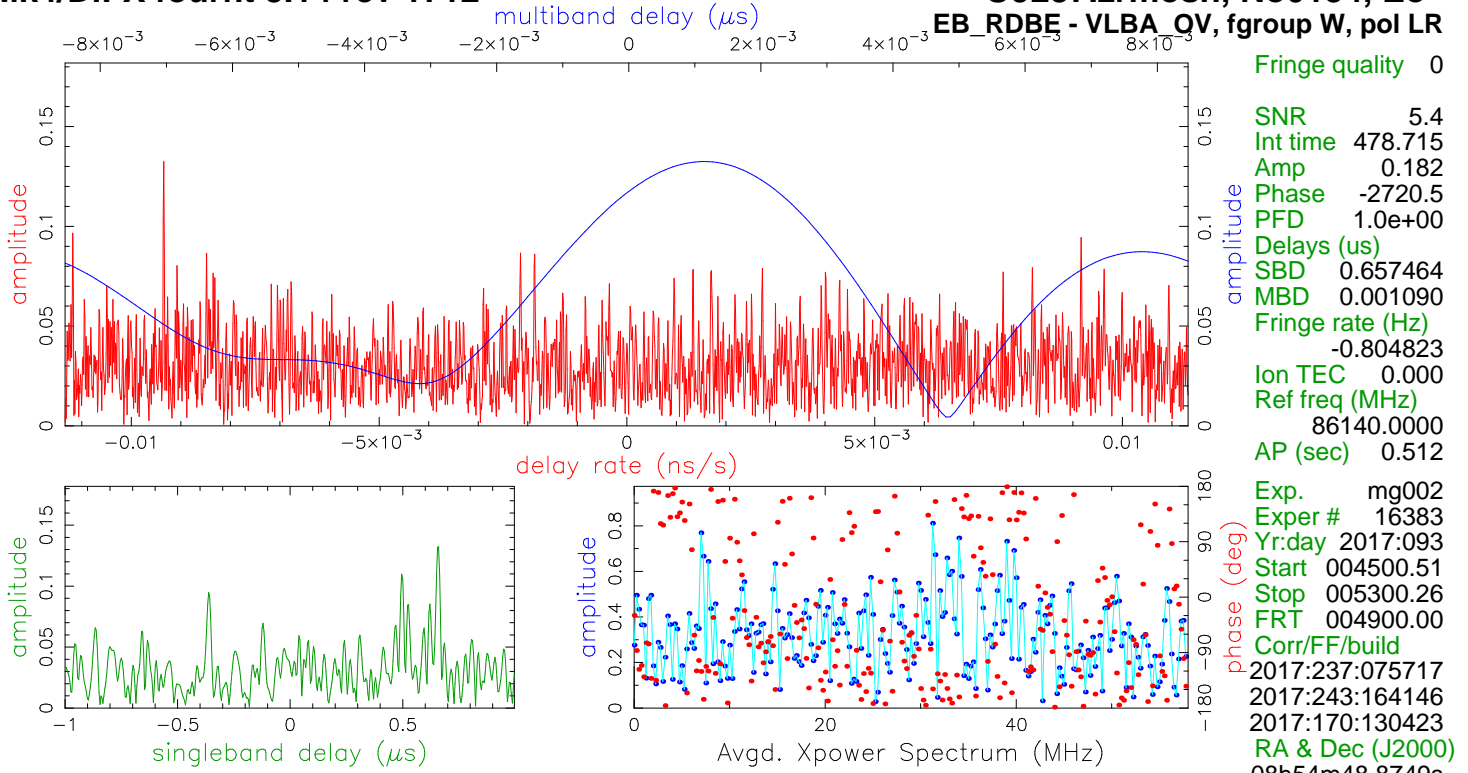


	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	-68.8	-70.6	-75.3	-67.2	Phase	-70.7
	0.3	0.3	0.4	0.3	Ampl.	0.3
	228.8	228.9	228.6	228.9	Sbd box	228.8
U/L	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	
o	3890	296	1703	3109	PC freqs	
E:o	0:0	0:0	0:0	0:0	PC phase	
E:o	0:0	0:0	0:0	0:0	Manl PC	
E	1000	1000	1000	1000	PC amp	
o	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
o	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	

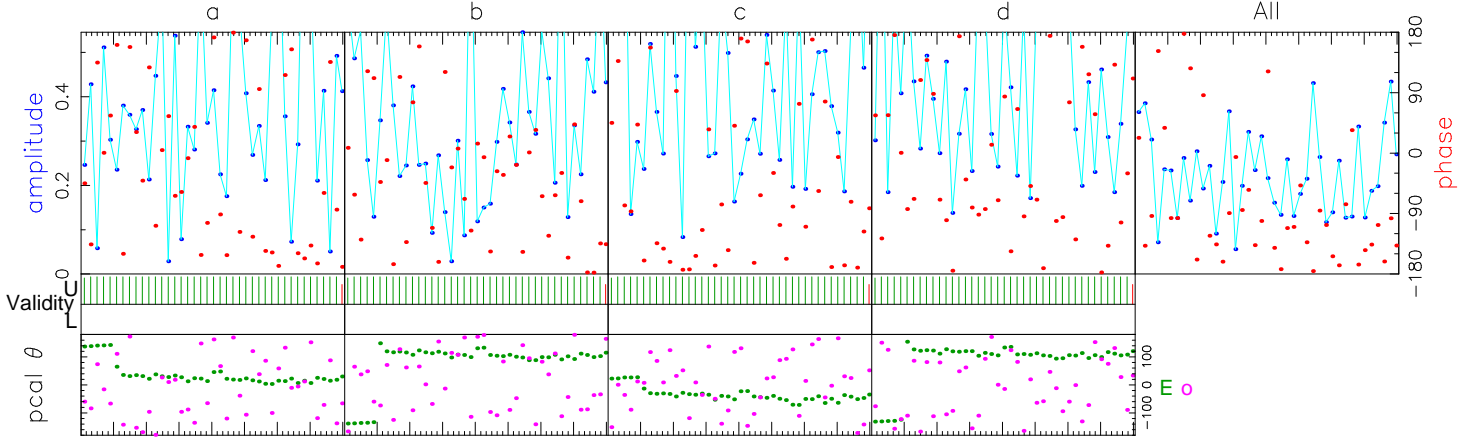
Group delay (usec)(sbd) -6.41300798364E+03 Apriori delay (usec) -6.41299061526E+03 Resid mbdelay (usec) -3.01711E-04 +/- 1.9E-04
 Sband delay (usec) -6.41300879954E+03 Apriori clock (usec) 2.6509430E+01 Resid sbdelay (usec) -1.81843E-02 +/- 7.3E-04
 Phase delay (usec) -6.41299061755E+03 Apriori clockrate (us/s) -2.5571426E-07 Resid phdelay (usec) -2.28136E-06 +/- 2.8E-07
 Delay rate (us/s) -1.77307137287E+00 Apriori rate (us/s) -1.77307134833E+00 Resid rate (us/s) -2.45381E-08 +/- 1.0E-09
 Total phase (deg) -218.1 Apriori accel (us/s/s) 4.06954193429E-05 Resid phase (deg) -2.5 +/- 8.8

RMS Theor. Amplitude 0.323 +/- 0.025 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 ph/seg (deg) 73.8 28.2 Search (2048X16) 0.314 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 amp/seg (%) 140.8 49.2 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 ph/frq (deg) 4.3 8.8 Inc. seg. avg. 0.595 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011
 amp/frq (%) 12.8 15.4 Inc. frq. avg. 0.319 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00

E: az 272.3 el 24.5 pa 42.6 o: az 97.6 el 43.7 pa -57.2 u,v (fr/asec) 10878.294 2488.215 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Eo..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Eo.W.134.zrmosn



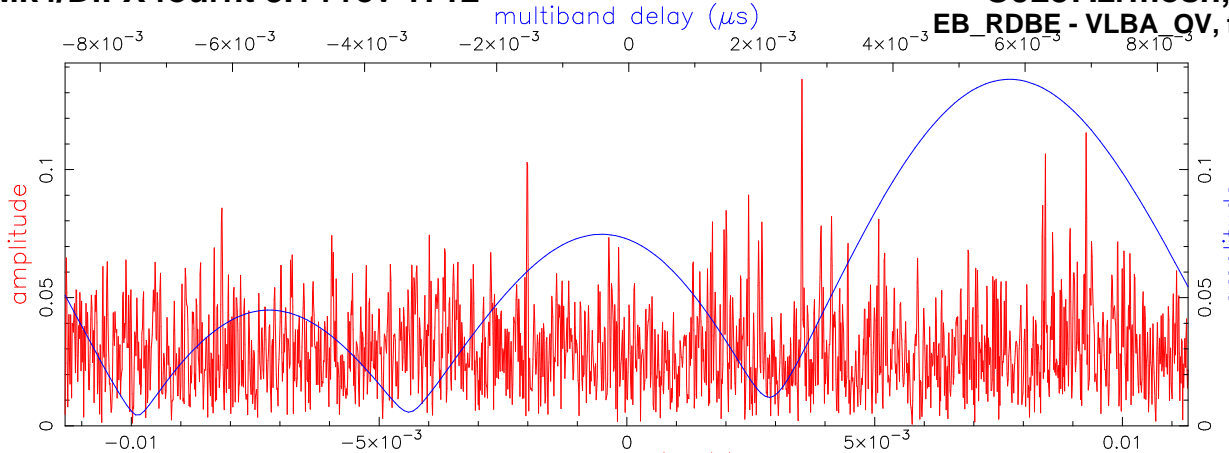
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



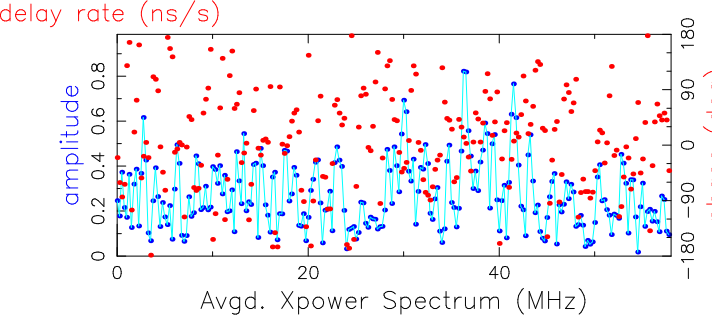
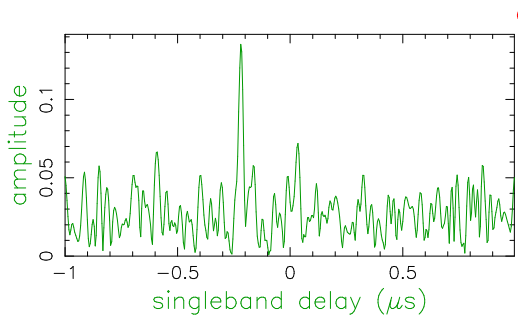
86151.11	86209.70	86268.30	86326.89	86385.38	All
-140.3	-75.8	-147.1	-118.8	-126.7	Phase
0.2	0.1	0.2	0.2	0.2	Ampl.
150.0	347.9	376.4	385.0	385.5	Sbd box
U/L 937/0	937/0	937/0	937/0	937/0	APs used
E 3890	296	1703	3109	3109	PC freqs
o 3890	296	1703	3109	3109	PC freqs
E:o 0:0	0:0	0:0	0:0	0:0	PC phase
E:o 0:0	0:0	0:0	0:0	0:0	Manl PC
E 1000	1000	1000	1000	1000	PC amp
o 1000	1000	1000	1000	1000	
E W00UL	W01UL	W02UL	W03UL		Chan ids
o W00UR	W01UR	W02UR	W03UR		Tracks
					Chan ids
					Tracks

Group delay (usec)(sbd)	-6.41234099187E+03	Apriori delay (usec)	-6.41299061526E+03	Resid mbdelay (usec)	1.09007E-03	+/-	4.5E-04
Sband delay (usec)	-6.41233315099E+03	Apriori clock (usec)	2.6509430E+01	Resid sbdelay (usec)	6.57464E-01	+/-	1.7E-03
Phase delay (usec)	-6.41299061935E+03	Apriori clockrate (us/s)	-2.5571426E-07	Resid phdelay (usec)	-4.08670E-06	+/-	6.8E-07
Delay rate (us/s)	-1.77308069153E+00	Apriori rate (us/s)	-1.77307134833E+00	Resid rate (us/s)	-9.34320E-06	+/-	2.5E-09
Total phase (deg)	-2936.1	Apriori accel (us/s/s)	4.06954193429E-05	Resid phase (deg)	-2720.5	+/-	21.0

ph/seg (deg)	66.8	Theor.	67.4	Amplitude	0.182 +/- 0.033	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5				
amp/seg (%)	97.4	Search (2048X16)	0.130	Search	0.130	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000				
ph/frq (deg)	40.3	Interp.	0.000	Interp.	0.000	Bits/sample:	2x2	SampCntNorm:	enabled	mb window (us)	-0.009 0.009		
amp/frq (%)	22.6	Inc. seg. avg.	0.180	Inc. seg. avg.	0.180	Sample rate (MSamp/s):	116	dr window (ns/s)	-0.011 0.011				
		Inc. frq. avg.	0.185	Inc. frq. avg.	0.185	Data rate (Mb/s):	928	nlags:	232	t_cohere	infinite	ion window (TEC)	0.00 0.00

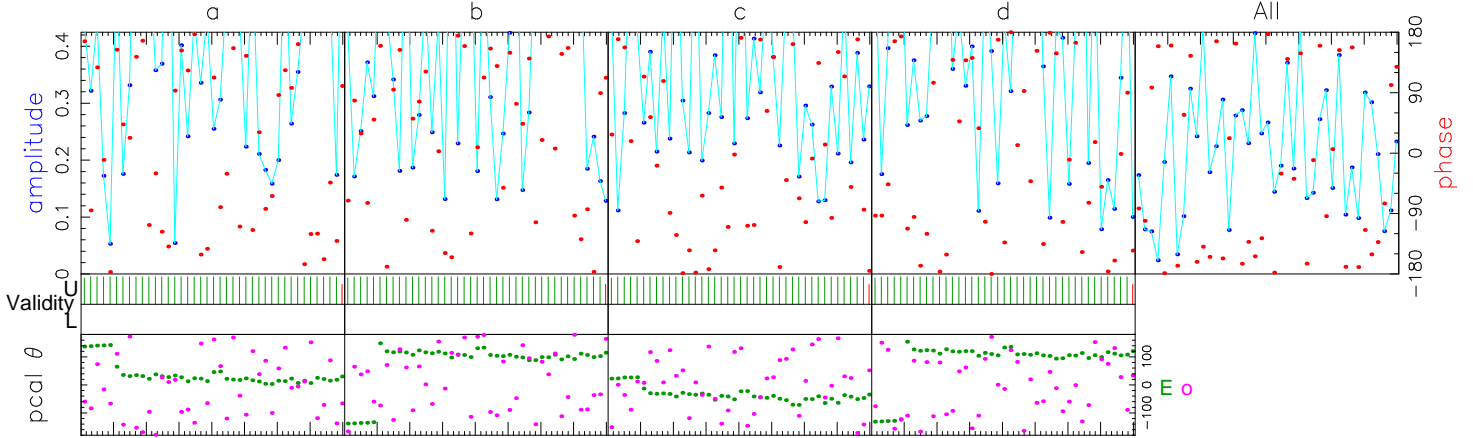


Fringe quality 0
 SNR 5.5
 Int time 478.710
 Amp 0.142
 Phase 718.1
 PFD 9.9e-01
 Delays (us)
 SBD -0.218648
 MBD 0.005748
 Fringe rate (Hz)
 0.304323
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512



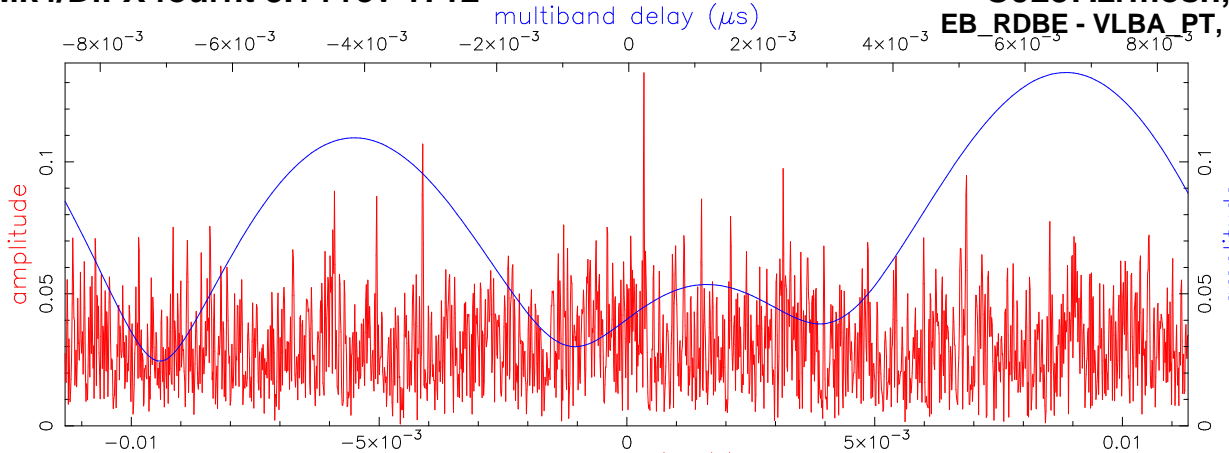
Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164147
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

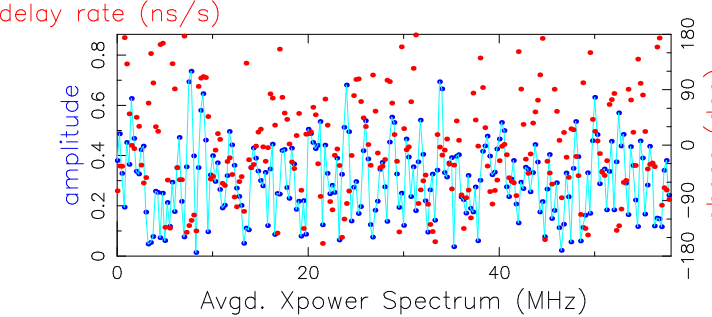
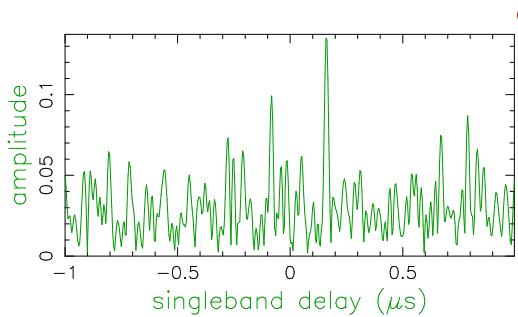


	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	
o	3890	296	1703	3109	PC freqs	
E:o	0:0	0:0	0:0	0:0	PC phase	
E:o	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
o	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
o	W00UL	W01UL	W02UL	W03UL	Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-6.41320673344E+03	Apriori delay (usec)	-6.41299061526E+03	Resid mbdelay (usec)	5.74849E-03	+/-	4.4E-04	
Sband delay (usec)	-6.41320926326E+03	Apriori clock (usec)	2.6509430E+01	Resid sbdelay (usec)	-2.18648E-01	+/-	1.7E-03	
Phase delay (usec)	-6.41299062072E+03	Apriori clockrate (us/s)	-2.5571426E-07	Resid phdelay (usec)	-5.45696E-06	+/-	6.7E-07	
Delay rate (us/s)	-1.77306781545E+00	Apriori rate (us/s)	-1.77307134833E+00	Resid rate (us/s)	3.53288E-06	+/-	2.4E-09	
Total phase (deg)	862.5	Apriori accel (us/s/s)	4.06954193429E-05	Resid phase (deg)	718.1	+/-	20.9	
RMS	71.5	Theor.	67.0	Amplitude	0.142 +/- 0.026	Pcal mode:	MANUAL, MANUAL	
ph/seg (deg)	101.5	116.9	Interp.	0.000	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	PC period (AP's)	5, 5
amp/seg (%)	17.2	20.9	Inc. seg. avg.	0.135	Bits/sample:	2x2	SampCntNorm:	enabled
ph/frq (deg)	23.8	36.5	Inc. frq. avg.	0.134	Sample rate(MSamp/s):	116	mb window (us)	-1.000 1.000
amp/frq (%)					Data rate(Mb/s):	928	dr window (ns/s)	-0.011 0.011
							ion window (TEC)	0.00 0.00

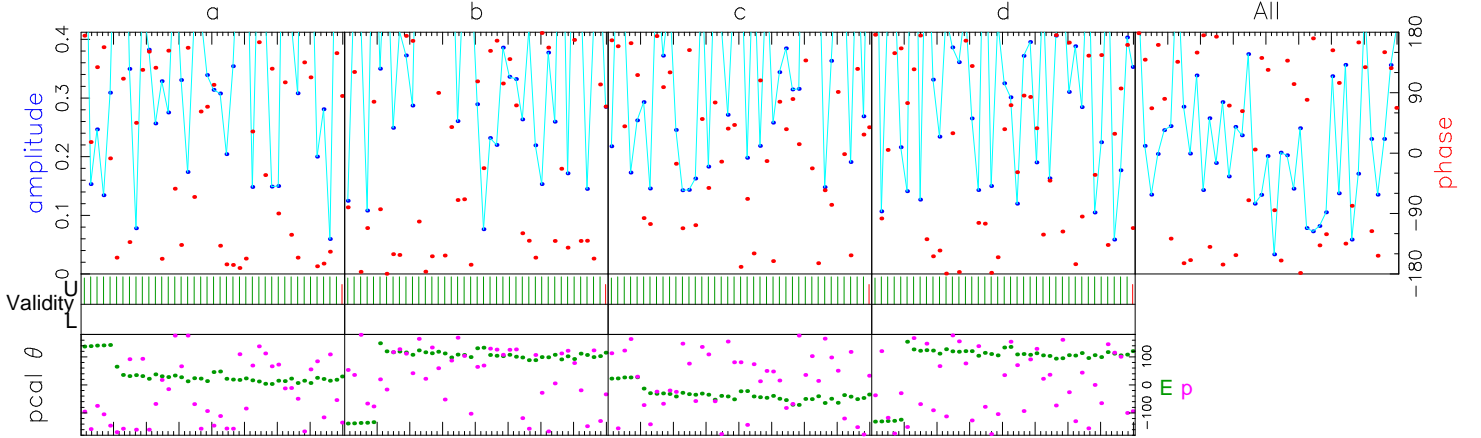


Fringe quality 0
 SNR 5.5
 Int time 478.614
 Amp 0.137
 Phase -451.7
 PFD 9.7e-01
 Delays (us)
 SBD 0.161441
 MBD 0.006527
 Fringe rate (Hz) 0.029801
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512



Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164150
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

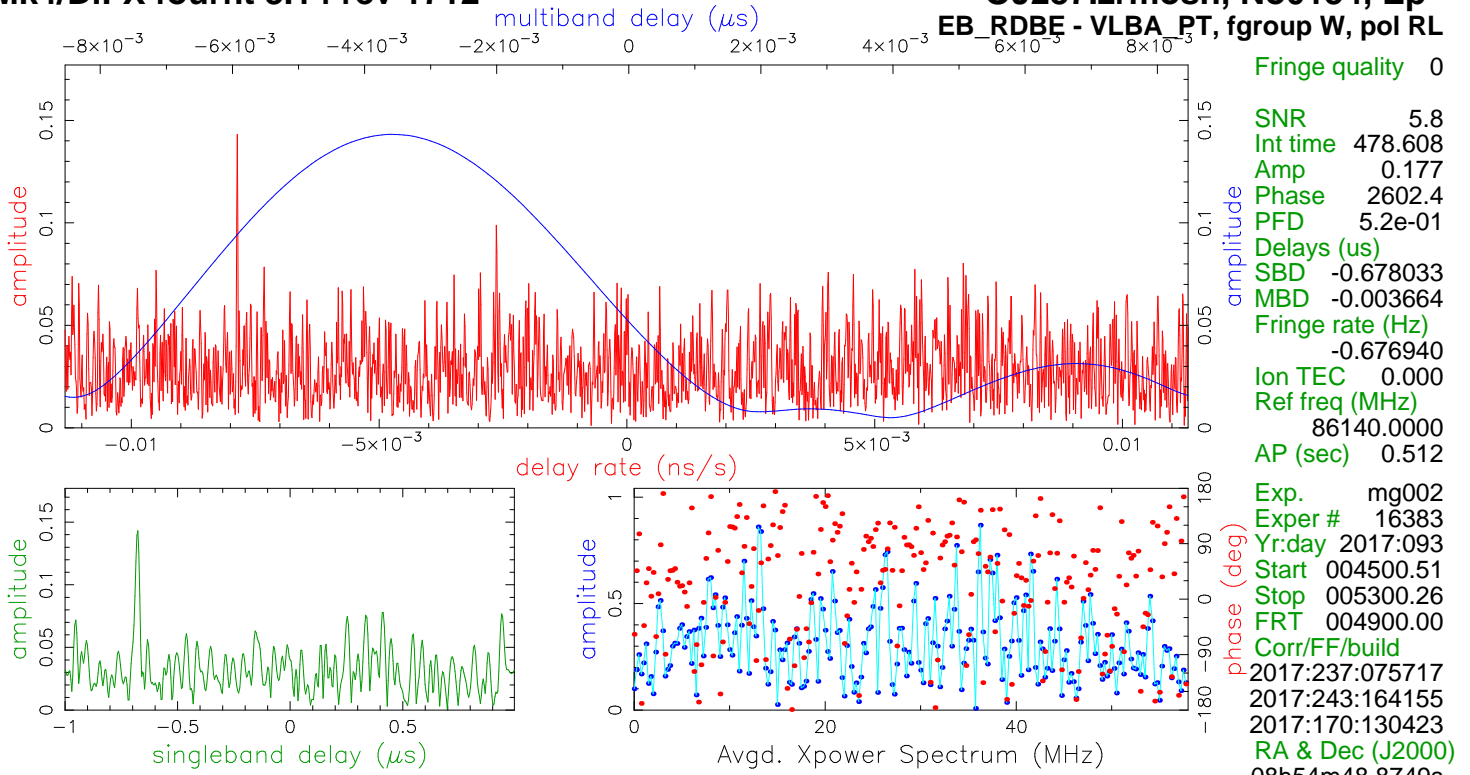
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



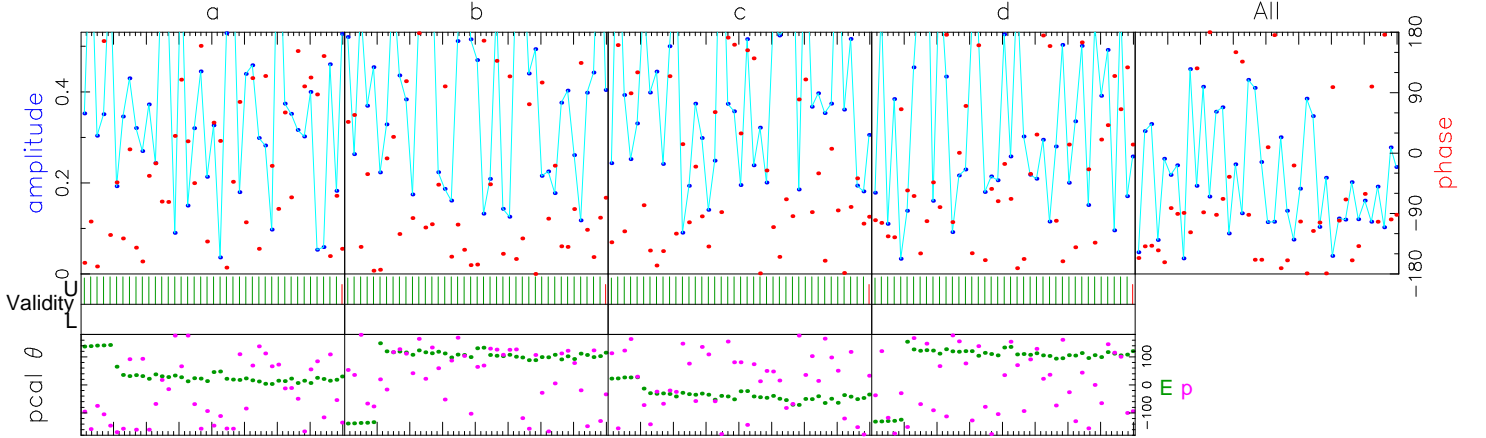
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
UL	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	
p	3890	296	1703	3109	PC freqs	
E:p	0:0	0:0	0:0	0:0	PC phase	
E:p	0:0	0:0	0:0	0:0	Mani PC	
F	1000	1000	1000	1000	PC amp	
p	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
p	W00UL	W01UL	W02UL	W03UL	Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-8.51893734400E+03	Apriori delay (usec)	-8.51909747130E+03	Resid mbdelay (usec)	6.52730E-03	+/- 4.4E-04
Sband delay (usec)	-8.51893603075E+03	Apriori clock (usec)	2.6325689E+01	Resid sbdelay (usec)	1.61441E-01	+/- 1.7E-03
Phase delay (usec)	-8.51909746606E+03	Apriori clockrate (us/s)	-2.6240506E-07	Resid phdelay (usec)	5.24193E-06	+/- 6.7E-07
Delay rate (us/s)	-1.65048292062E+00	Apriori rate (us/s)	-1.65048326658E+00	Resid rate (us/s)	3.45958E-07	+/- 2.4E-09
Total phase (deg)	-515.9	Apriori accel (us/s/s)	5.34934337798E-05	Resid phase (deg)	-451.7	+/- 20.7

ph/seg (deg)	64.2	Theor.	66.3	Amplitude	0.137 +/- 0.025	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5
amp/seg (%)	105.9	Search (2048X16)	0.132	Interp.	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	sb window (us) -1.000 1.000
ph/frq (deg)	58.4	Inc. seg. avg.	0.135	Inc. frq. avg.	0.147	Bits/sample: 2x2	SampCntNorm: enabled
amp/frq (%)	33.5	mb window (us)	-0.009 0.009	dr window (ns/s)	-0.011 0.011	Sample rate(MSamp/s): 116	ion window (TEC) 0.00 0.00
		Data rate(Mb/s): 928	nlags: 232	t_cohere infinite			



Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



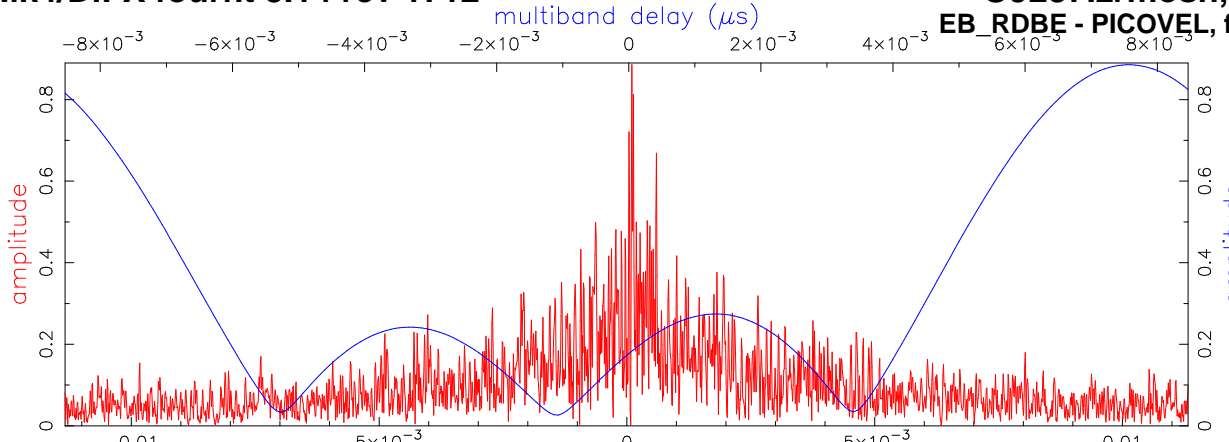
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109	APs used	
p	3890	296	1703	3109	PC freqs	
E:p	0:0	0:0	0:0	0:0	PC phase	
E:p	0:0	0:0	0:0	0:0	Mani PC	
F	1000	1000	1000	1000	PC amp	
p	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
p	W00UL	W01UL	W02UL	W03UL	Tracks	
					Chan ids	
					Tracks	

Group delay (usec)(sbd)	-8.51978380193E+03	Apriori delay (usec)	-8.51909747130E+03	Resid mbdelay (usec)	-3.66396E-03	+/-	4.2E-04
Sband delay (usec)	-8.51977550441E+03	Apriori clock (usec)	2.6325689E+01	Resid sbdelay (usec)	-6.78033E-01	+/-	1.6E-03
Phase delay (usec)	-8.51909747543E+03	Apriori clockrate (us/s)	-2.6240506E-07	Resid phdelay (usec)	-4.12176E-06	+/-	6.4E-07
Delay rate (us/s)	-1.65049112518E+00	Apriori rate (us/s)	-1.65048326658E+00	Resid rate (us/s)	-7.85860E-06	+/-	2.3E-09
Total phase (deg)	2538.3	Apriori accel (us/s/s)	5.34934337798E-05	Resid phase (deg)	2602.4	+/-	19.7

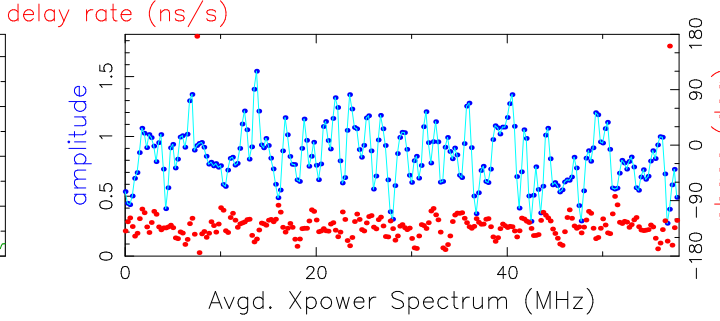
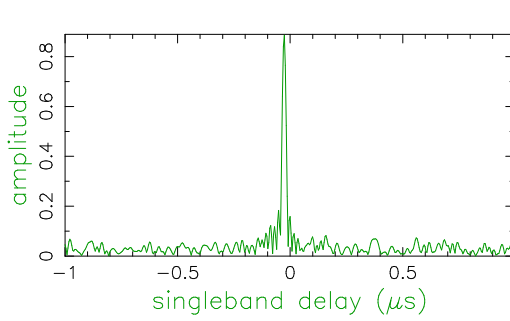
ph/seg (deg)	60.8	Theor.	63.2	Amplitude	0.177 +/- 0.031	Pcal mode:	MANUAL, MANUAL	PC period (AP's)	5, 5
amp/seg (%)	93.2	Search (2048X16)	0.138	Search	0.138	Pcal rate:	0.000E+00, 0.000E+00 (us/s)	sb window (us)	-1.000 1.000
ph/frq (deg)	11.4	Interp.	0.000	Interp.	0.000	Bits/sample:	2x2	SampCntNorm:	enabled
amp/frq (%)	24.5	Inc. seg. avg.	0.161	Inc. seg. avg.	0.161	Sample rate(MSamp/s):	116	mb window (us)	-0.009 0.009
		Inc. frq. avg.	0.168	Inc. frq. avg.	0.168	Data rate(Mb/s):	928	dr window (ns/s)	-0.011 0.011
						nlags:	232	ion window (TEC)	0.00 0.00

E: az 272.3 el 24.5 pa 42.6 p: az 101.8 el 52.4 pa -59.2 u,v (fr/asec) 10153.542 3204.011 simultaneous interpolator

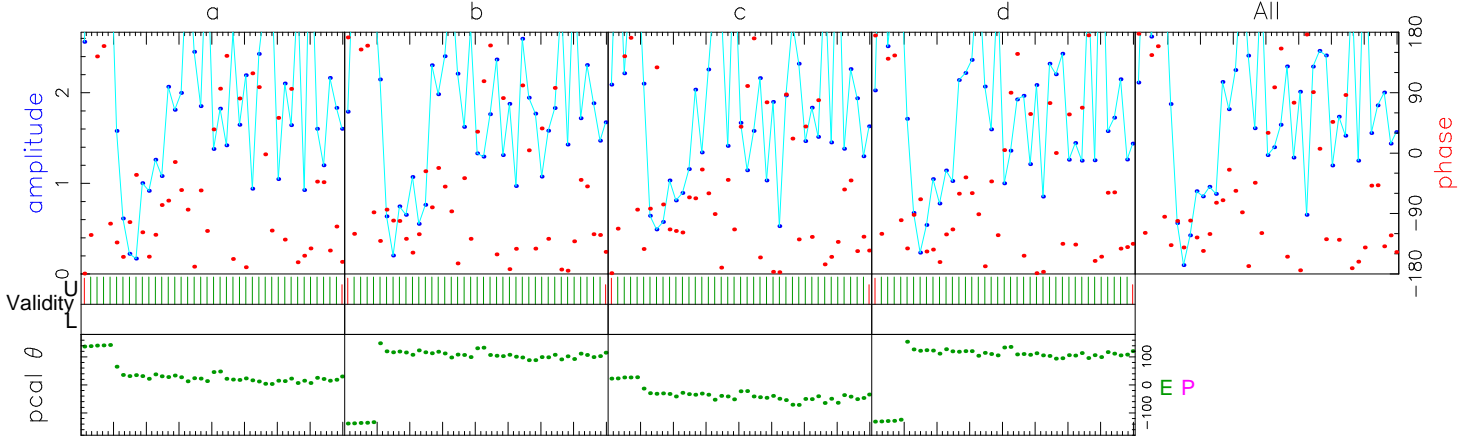
Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ep..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/Ep.W.140.zrmosn



Fringe quality 7
 SNR 35.7
 Int time 473.968
 Amp 0.890
 Phase 4.6
 PFD 0.0e+00
 Delays (us)
 SBD -0.026847
 MBD 0.007563
 Fringe rate (Hz) 0.008697
 Ion TEC 0.000
 Ref freq (MHz) 86140.000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build 2017:237:075717
 2017:243:164159
 2017:170:130423
 RA & Dec (J2000) 08h54m48.8749s +20°06'30.641"



Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

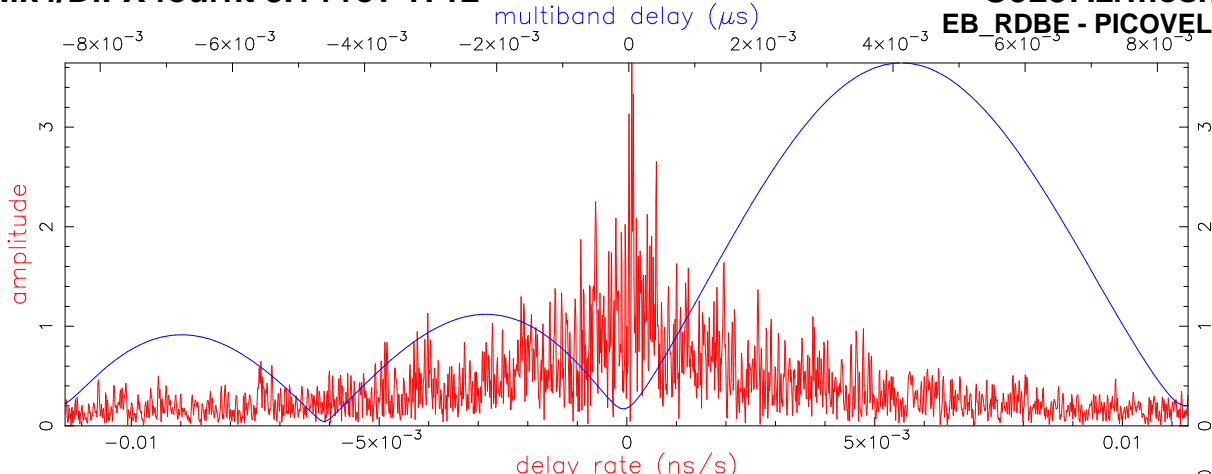


	86151.11	86209.70	86268.30	86326.89	All
U/L	937/0	937/0	937/0	937/0	
E	3890	296	1703	3109	
P	0	0	0	0	
E:P	0:0	0:0	0:0	0:0	
E:P	0:0	0:0	0:0	0:0	
E	1000	1000	1000	1000	
P	1000	1000	1000	1000	
E	W00UR	W01UR	W02UR	W03UR	
P	W00UR	W01UR	W02UR	W03UR	

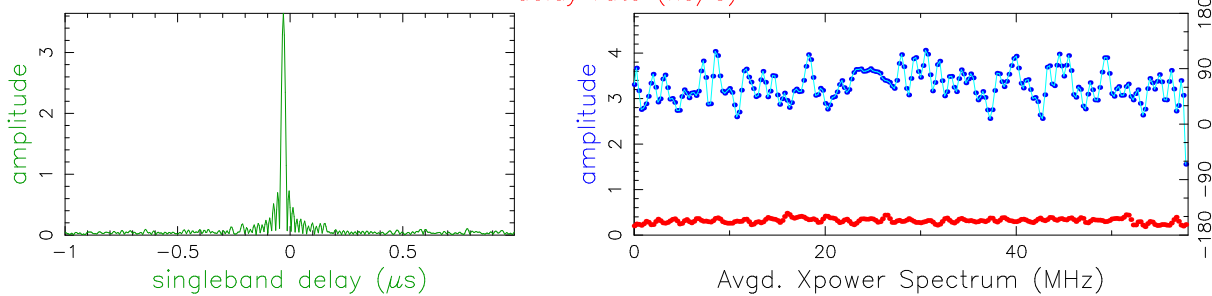
	86151.11	86209.70	86268.30	86326.89	All
Group delay (usec)(sbd)	-2.20193878021E+03	-2.20193905698E+03	-2.20191221008E+03	-2.20191221008E+03	-2.20191221008E+03
Sband delay (usec)	-2.20193905698E+03	-2.20191221433E+03	-2.20191221433E+03	-2.20191221433E+03	-2.20191221433E+03
Phase delay (usec)	-2.20191221433E+03	-2.20191221433E+03	-2.20191221433E+03	-2.20191221433E+03	-2.20191221433E+03
Delay rate (us/s)	1.64248544326E-01	1.64248544326E-01	1.64248544326E-01	1.64248544326E-01	1.64248544326E-01
Total phase (deg)		85.1			

	86151.11	86209.70	86268.30	86326.89	All
Apriori delay (usec)	-2.20191221008E+03	-2.20191221008E+03	-2.20191221008E+03	-2.20191221008E+03	-2.20191221008E+03
Apriori clock (usec)	2.7827644E+01	2.7827644E+01	2.7827644E+01	2.7827644E+01	2.7827644E+01
Apriori clockrate (us/s)	-5.1787036E-07	-5.1787036E-07	-5.1787036E-07	-5.1787036E-07	-5.1787036E-07
Apriori rate (us/s)	1.64248443365E-01	1.64248443365E-01	1.64248443365E-01	1.64248443365E-01	1.64248443365E-01
Apriori accel (us/s/s)	1.83931834789E-05	1.83931834789E-05	1.83931834789E-05	1.83931834789E-05	1.83931834789E-05
Resid mbdelay (usec)	7.56321E-03	7.56321E-03	7.56321E-03	7.56321E-03	7.56321E-03
Resid sbdelay (usec)	-2.68469E-02	-2.68469E-02	-2.68469E-02	-2.68469E-02	-2.68469E-02
Resid phdelay (usec)	-4.25355E-06	-4.25355E-06	-4.25355E-06	-4.25355E-06	-4.25355E-06
Resid rate (us/s)	1.00962E-07	1.00962E-07	1.00962E-07	1.00962E-07	1.00962E-07
Resid phase (deg)	4.6	4.6	4.6	4.6	4.6

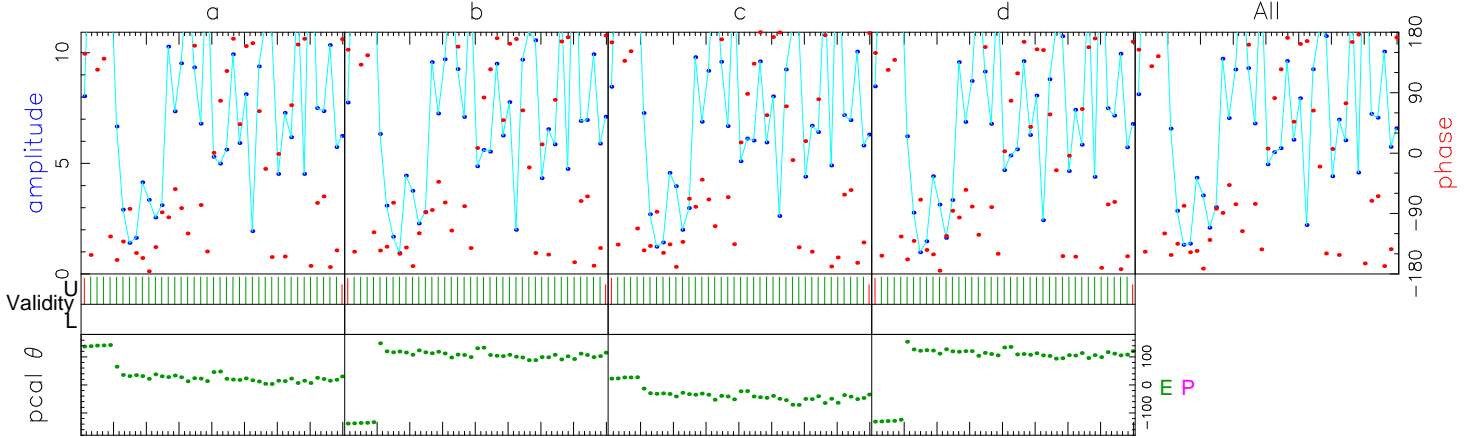
E: az 272.3 el 24.5 pa 42.6 P: az 272.4 el 31.4 pa 58.1 u,v (fr/asec) -970.030 1940.682 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EP..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EP.W.142.zrmosn



Fringe quality 5
 SNR 146.1
 Int time 473.974
 Amp 3.645
 Phase -18.6
 PFD 0.0e+00
 Delays (us)
 SBD -0.030203
 MBD 0.004124
 Fringe rate (Hz) 0.008676
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build 2017:237:075717
 2017:243:164201
 2017:170:130423
 RA & Dec (J2000) 08h54m48.8749s +20°06'30.641"



Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

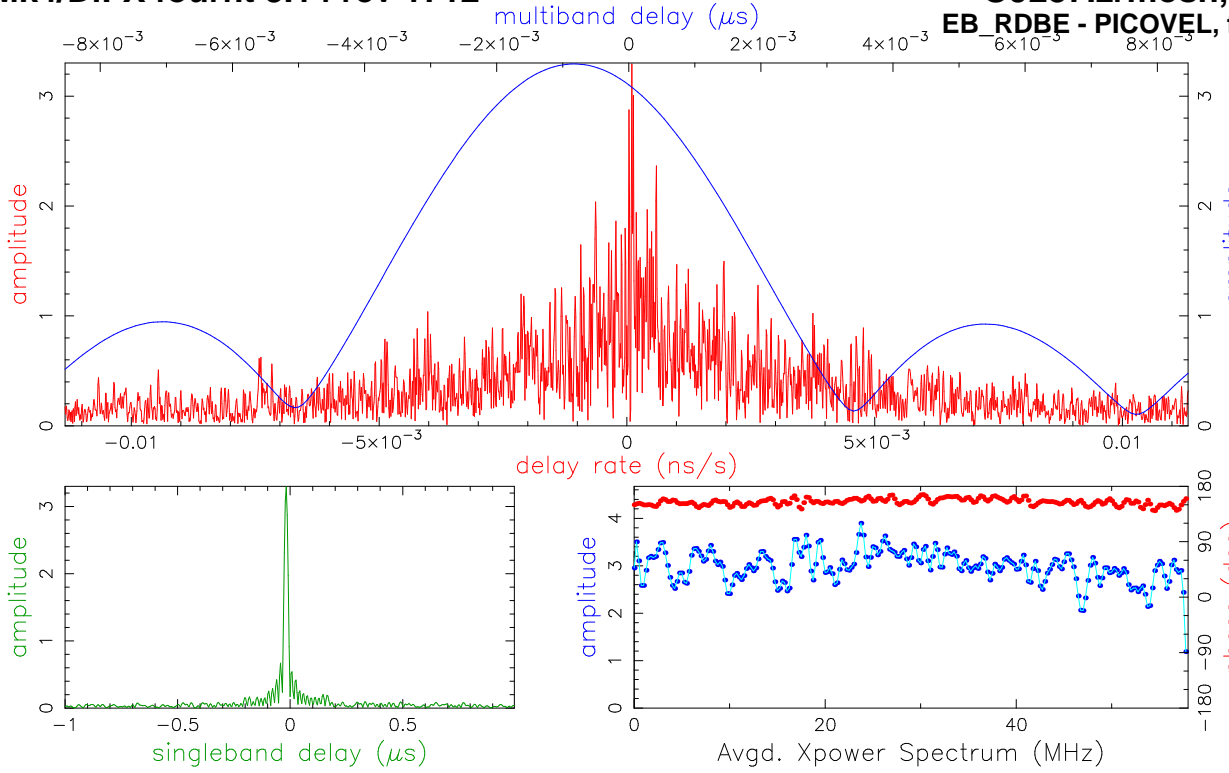


	86151.11	86209.70	86268.30	86326.89	86385.48	All
UL	937/0	937/0	937/0	937/0	937/0	
E	3890	296	1703	3109	3890	
P	0	0	0	0	0	
E:P	0:0	0:0	0:0	0:0	0:0	
E:P	0:0	0:0	0:0	0:0	0:0	
PE	1000	1000	1000	1000	1000	
P	1000	1000	1000	1000	1000	
E	W00UL	W01UL	W02UL	W03UL	W04UL	
P	W00UR	W01UR	W02UR	W03UR	W04UR	

	86151.11	86209.70	86268.30	86326.89	86385.48	All
Group delay (usec)(sbd)	-2.20194221962E+03	-2.20194221962E+03	-2.20191221008E+03	-2.20191221008E+03	-2.20191221008E+03	-2.20191221008E+03
Sband delay (usec)	-2.20194241312E+03	-2.20194241312E+03	-2.20191221508E+03	-2.20191221508E+03	-2.20191221508E+03	-2.20191221508E+03
Phase delay (usec)	-2.20191221508E+03	-2.20191221508E+03	-2.20191221508E+03	-2.20191221508E+03	-2.20191221508E+03	-2.20191221508E+03
Delay rate (us/s)	1.64248544083E-01	1.64248544083E-01	1.64248443365E-01	1.64248443365E-01	1.64248443365E-01	1.64248443365E-01
Total phase (deg)		61.9				

	86151.11	86209.70	86268.30	86326.89	86385.48	All
Apriori delay (usec)						
Apriori clock (usec)						
Apriori clockrate (us/s)						
Apriori rate (us/s)						
Apriori accel (us/s/s)						
Resid mbdelay (usec)						
Resid sbdelay (usec)						
Resid phdelay (usec)						
Resid rate (us/s)						
Resid phase (deg)						

ph/seg (deg) 76.0 2.5 Search (2048X16) 3.607 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 amp/seg (%) 160.0 4.4 Interp. 0.000 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 ph/frq (deg) 6.7 0.8 Inc. seg. avg. 7.827 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 amp/frq (%) 1.8 1.4 Inc. frq. avg. 3.658 Sample rate(MSamp/s): 116 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite dr window (ns/s) -0.011 0.011
 E: az 272.3 el 24.5 pa 42.6 P: az 272.4 el 31.4 pa 58.1 u,v (fr/asec) -970.030 1940.682 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EP..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EP.W.143.zrmosn

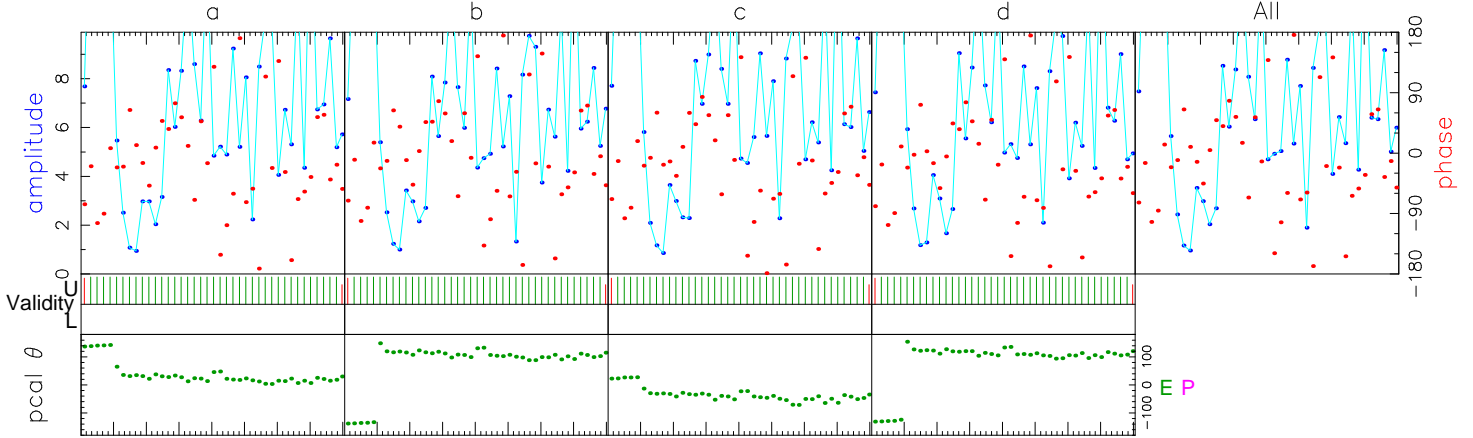


Fringe quality 5

SNR 132.3
 Int time 473.968
 Amp 3.302
 Phase 44.2
 PFD 0.0e+00
 Delays (us)
 SBD -0.017983
 MBD -0.000829
 Fringe rate (Hz) 0.008702
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512

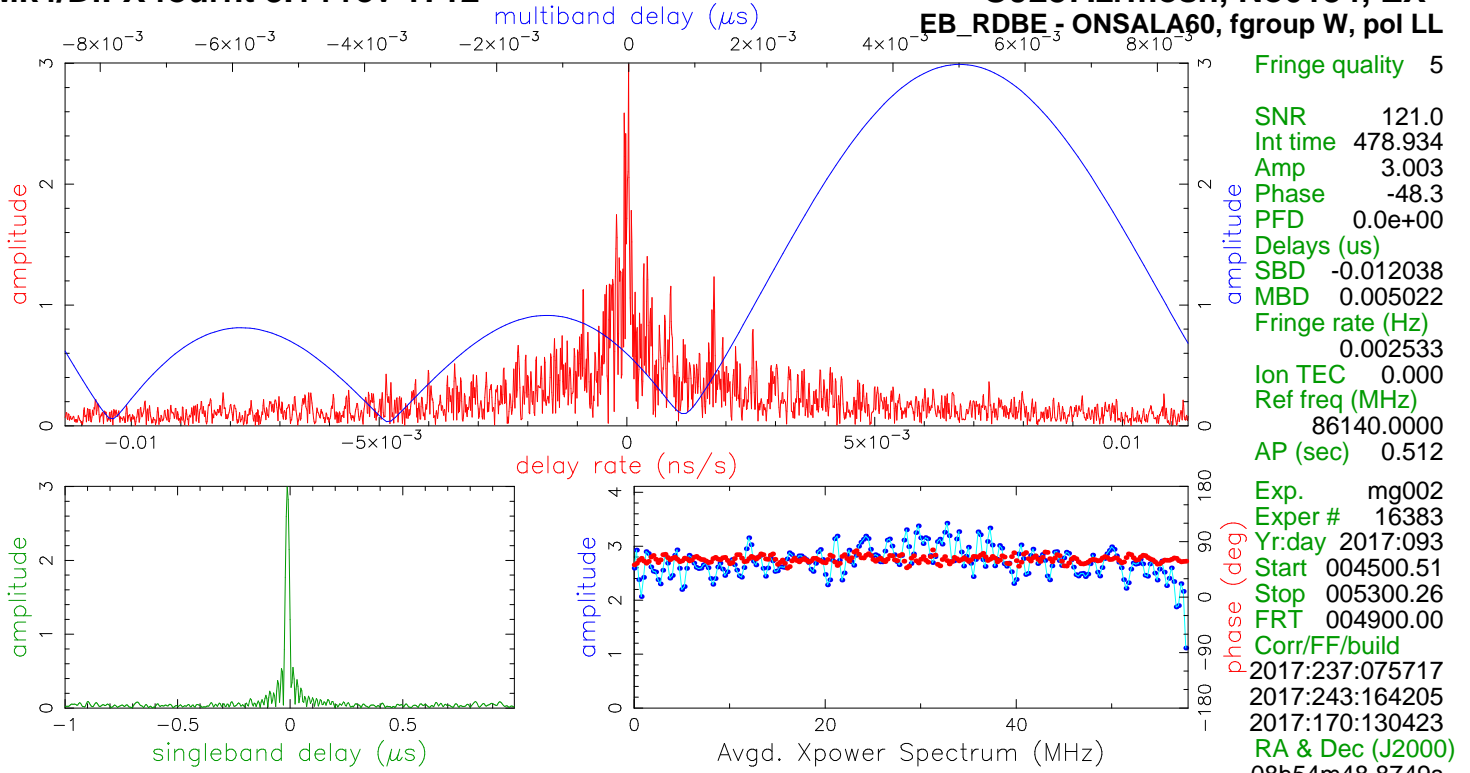
Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164202
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
UL	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109		
P	0	0	0	0		
E:P	0:0	0:0	0:0	0:0		
E:P	0:0	0:0	0:0	0:0		
E	1000	1000	1000	1000		
P	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR		
P	W00UL	W01UL	W02UL	W03UL		
Group delay (usec)(sbd)	-2.20193010604E+03		Apriori delay (usec)	-2.20191221008E+03	Resid mbdelay (usec)	-8.29291E-04 +/- 1.8E-05
Sband delay (usec)	-2.20193019270E+03		Apriori clock (usec)	2.7827644E+01	Resid sbdelay (usec)	-1.79826E-02 +/- 7.2E-05
Phase delay (usec)	-2.20191221086E+03		Apriori clockrate (us/s)	-5.1787036E-07	Resid phdelay (usec)	-7.75380E-07 +/- 2.8E-08
Delay rate (us/s)	1.64248544390E-01		Apriori rate (us/s)	1.64248443365E-01	Resid rate (us/s)	1.01025E-07 +/- 1.0E-10
Total phase (deg)		-235.3	Apriori accel (us/s/s)	1.83931834789E-05	Resid phase (deg)	44.2 +/- 0.9

RMS Theor. Amplitude 3.302 +/- 0.025 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 ph/seg (deg) 76.8 2.8 Search (2048X16) 3.243 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 amp/seg (%) 161.2 4.8 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 ph/frq (deg) 5.2 0.9 Inc. seg. avg. 7.074 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011
 amp/frq (%) 3.4 1.5 Inc. frq. avg. 3.300 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00



Fringe quality 5

SNR 121.0

Int time 478.934

Amp 3.003

Phase -48.3

PFD 0.0e+00

Delays (us)

SBD -0.012038

MBD 0.005022

Fringe rate (Hz) 0.002533

Ion TEC 0.000

Ref freq (MHz) 86140.0000

AP (sec) 0.512

Exp. mg002

Exper # 16383

Yr:day 2017:093

Start 004500.51

Stop 005300.26

FRT 004900.00

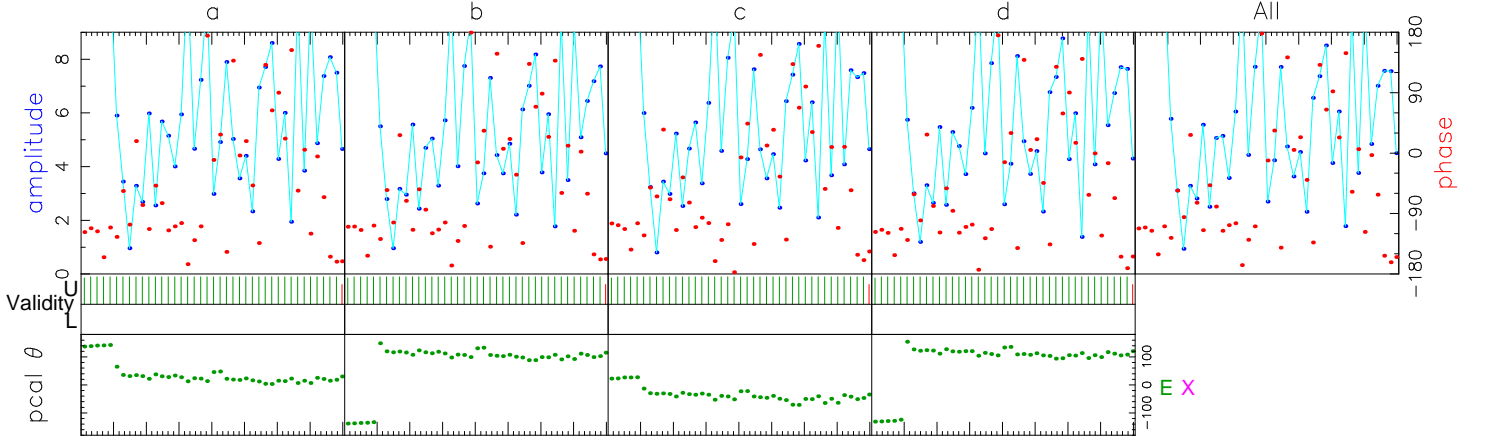
Corr/FF/build 2017:237:075717

2017:243:164205

2017:170:130423

RA & Dec (J2000) 08h54m48.8749s +20°06'30.641"

Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	86385.48	All
UL	937/0	937/0	937/0	937/0	937/0	937/0
E	3890	296	1703	3109	3109	3109
X	0	0	0	0	0	0
E:X	0:0	0:0	0:0	0:0	0:0	0:0
E:X	0:0	0:0	0:0	0:0	0:0	0:0
E	1000	1000	1000	1000	1000	1000
X	1000	1000	1000	1000	1000	1000
E	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL
X	W00UL	W01UL	W02UL	W03UL	W04UL	W05UL
Group delay (usec)(sbd)	8.89369957178E+02	8.89369963367E+02	8.89382001712E+02	8.89382001712E+02	8.89382001712E+02	8.89382001712E+02
Sband delay (usec)	8.89369963367E+02	8.89369963367E+02	8.89382001712E+02	8.89382001712E+02	8.89382001712E+02	8.89382001712E+02
Phase delay (usec)	8.89381997952E+02	8.89381997952E+02	8.89382001712E+02	8.89382001712E+02	8.89382001712E+02	8.89382001712E+02
Delay rate (us/s)	-1.24599188760E-01	-1.24599188760E-01	-1.24599218162E-01	-1.24599218162E-01	-1.24599218162E-01	-1.24599218162E-01
Total phase (deg)		177.5				
Apriori delay (usec)			2.827	2.827	2.827	2.827
Apriori clock (usec)			2.5330647E+01	2.5330647E+01	2.5330647E+01	2.5330647E+01
Apriori clockrate (us/s)			-3.1275907E-07	-3.1275907E-07	-3.1275907E-07	-3.1275907E-07
Apriori rate (us/s)			-1.24599218162E-01	-1.24599218162E-01	-1.24599218162E-01	-1.24599218162E-01
Apriori accel (us/s/s)			-7.32617409997E-06	-7.32617409997E-06	-7.32617409997E-06	-7.32617409997E-06
Resid mbdelay (usec)			5.02213E-03	5.02213E-03	5.02213E-03	5.02213E-03
Resid sbdelay (usec)			-1.20383E-02	-1.20383E-02	-1.20383E-02	-1.20383E-02
Resid phdelay (usec)			-3.76011E-06	-3.76011E-06	-3.76011E-06	-3.76011E-06
Resid rate (us/s)			2.94016E-08	2.94016E-08	2.94016E-08	2.94016E-08
Resid phase (deg)			-48.3	-48.3	-48.3	-48.3

ph/seg (deg) 80.1 3.0 3.0 3.0 3.0 3.0

amp/seg (%) 144.5 5.3 5.3 5.3 5.3 5.3

ph/frq (deg) 3.6 0.9 0.9 0.9 0.9 0.9

amp/frq (%) 2.8 1.7 1.7 1.7 1.7 1.7

RMS 3.003 +/- 0.025

Theor. 3.0

Amplitude 3.003 +/- 0.025

Search (2048X16) 2.827

Interp. 0.000

Inc. seg. avg. 6.145

Inc. frq. avg. 2.994

Group delay (usec)(sbd) 8.89369957178E+02

Sband delay (usec) 8.89369963367E+02

Phase delay (usec) 8.89381997952E+02

Delay rate (us/s) -1.24599188760E-01

Total phase (deg) 177.5

Apriori delay (usec) 2.827

Apriori clock (usec) 2.5330647E+01

Apriori clockrate (us/s) -3.1275907E-07

Apriori rate (us/s) -1.24599218162E-01

Apriori accel (us/s/s) -7.32617409997E-06

Resid mbdelay (usec) 5.02213E-03

Resid sbdelay (usec) -1.20383E-02

Resid phdelay (usec) -3.76011E-06

Resid rate (us/s) 2.94016E-08

Resid phase (deg) -48.3

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

lags: 232

t_cohere infinite

PC period (AP's) 5, 5

sb window (us) -1.000 1.000

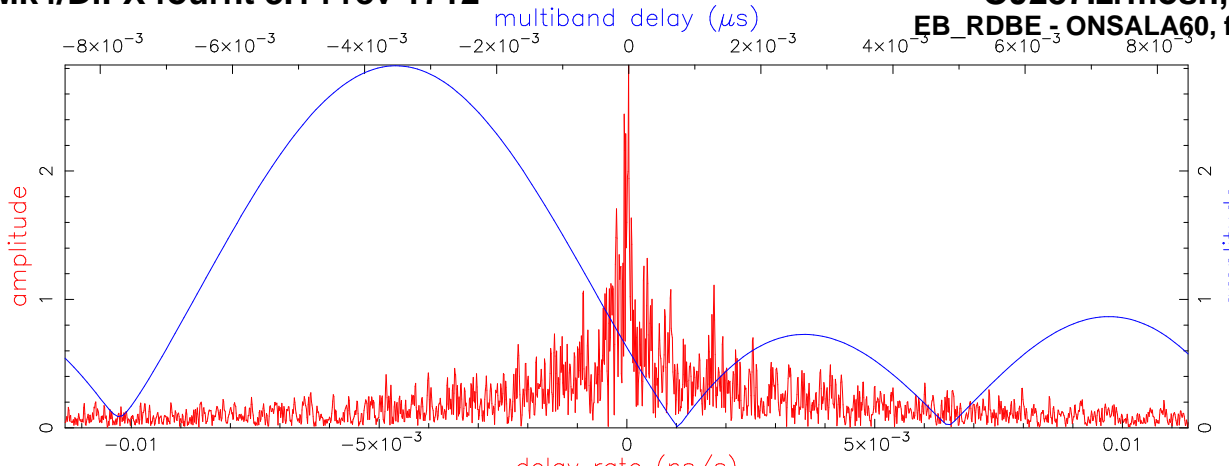
mb window (us) -0.009 0.009

dr window (ns/s) -0.011 0.011

ion window (TEC) 0.00 0.00

E: az 272.3 el 24.5 pa 42.6 X: az 273.4 el 21.8 pa 34.9 u,v (fr/asec) 747.104 -802.789 simultaneous interpolator

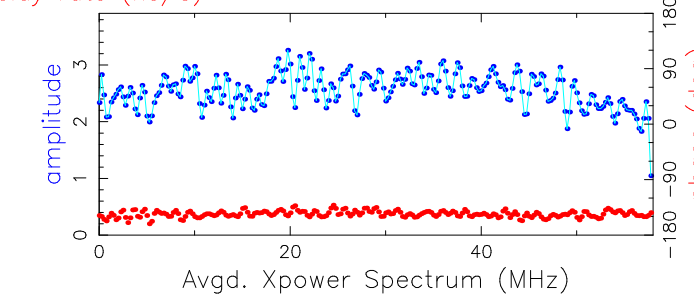
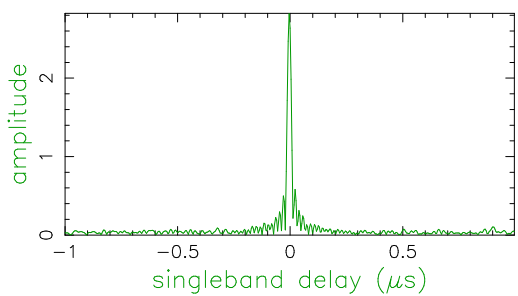
Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EX..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EX.W.145.zrmosn



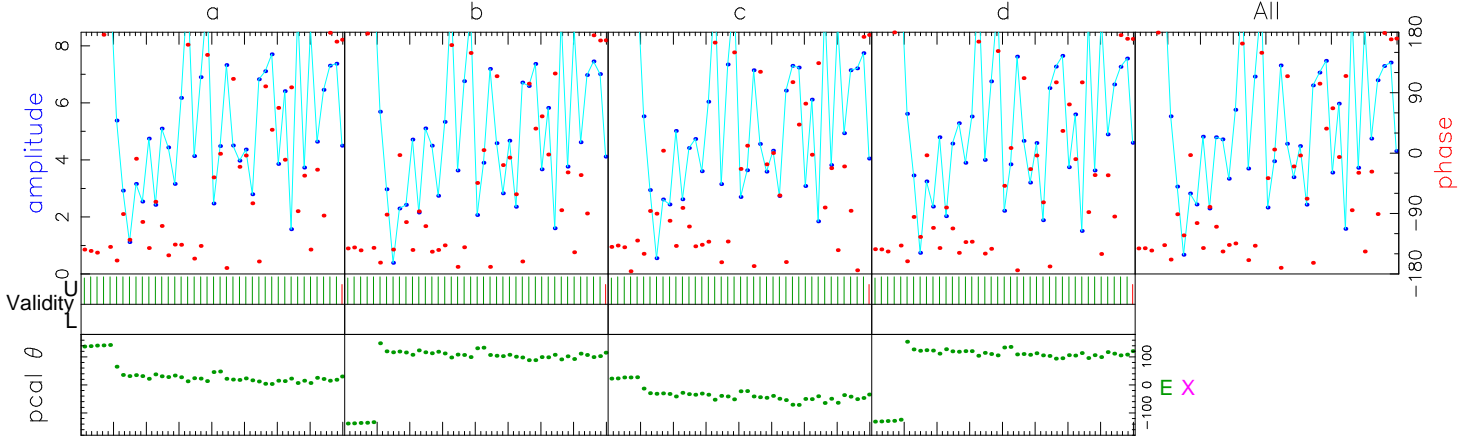
Fringe quality 5

SNR 113.9
Int time 478.928
Amp 2.826
Phase -146.8
PFD 0.0e+00
Delays (us)
SBD -0.003612
MBD -0.003527
Fringe rate (Hz) 0.002535
Ion TEC 0.000
Ref freq (MHz) 86140.0000
AP (sec) 0.512

Exp. mg002
Exper # 16383
Yr:day 2017:093
Start 004500.51
Stop 005300.26
FRT 004900.00
Corr/FF/build
2017:237:075717
2017:243:164207
2017:170:130423
RA & Dec (J2000)
08h54m48.8749s
+20°06'30.641"



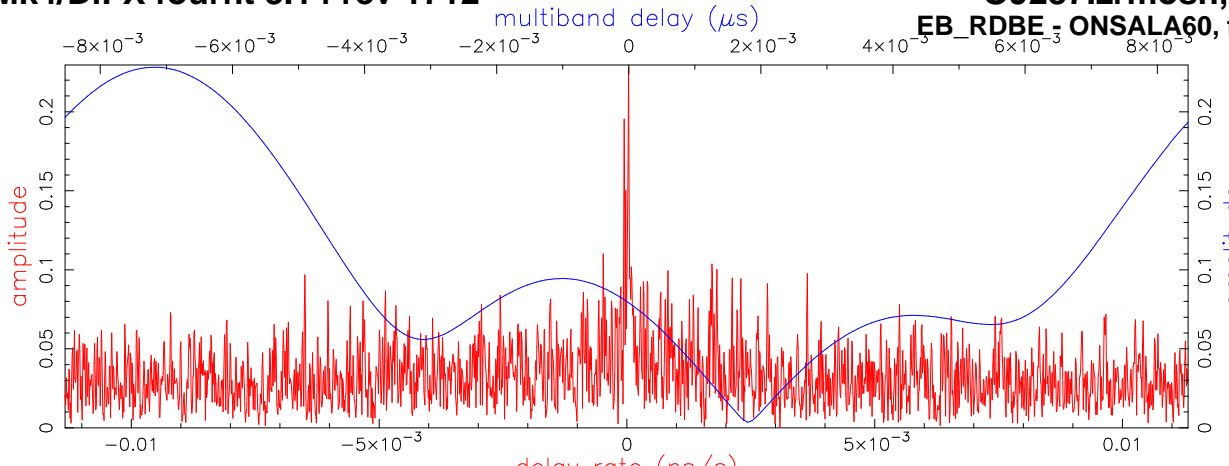
Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



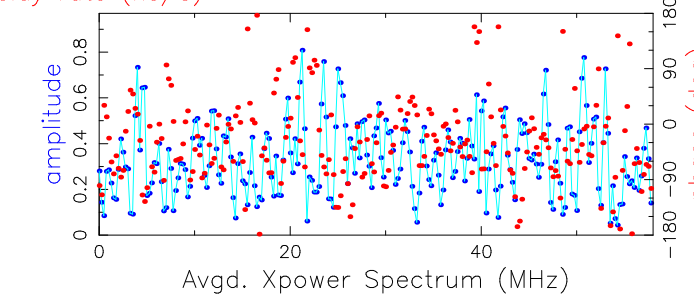
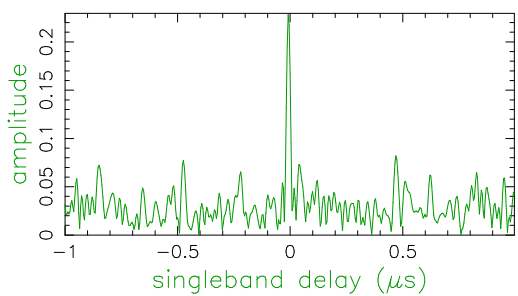
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
	-147.3	-148.3	-142.7	-149.0	Phase	-146.8
	2.8	2.7	2.8	2.9	Ampl.	2.8
	232.3	232.3	232.0	232.1	Sbd box	232.2
U/L	937/0	937/0	937/0	937/0	APs used	
E	3890	296	1703	3109	PC freqs	
X	0	0	0	0	PC freqs	
E:X	0:0	0:0	0:0	0:0	PC phase	
E:X	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
X	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR	Chan ids	
X	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	8.89378474878E+02	Apriori delay (usec)	8.89382001712E+02	Resid mbdelay (usec)	-3.52683E-03	+/- 2.1E-05
Sband delay (usec)	8.89378389298E+02	Apriori clock (usec)	2.5330647E+01	Resid sbdelay (usec)	-3.61241E-03	+/- 8.3E-05
Phase delay (usec)	8.89381996978E+02	Apriori clockrate (us/s)	-3.1275907E-07	Resid phdelay (usec)	-4.73457E-06	+/- 3.2E-08
Delay rate (us/s)	-1.24599188736E-01	Apriori rate (us/s)	-1.24599218162E-01	Resid rate (us/s)	2.94257E-08	+/- 1.2E-10
Total phase (deg)		Apriori accel (us/s/s)	-7.32617409997E-06	Resid phase (deg)	-146.8	+/- 1.0

RMS Theor. Amplitude 2.826 +/- 0.025 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 ph/seg (deg) 80.4 3.2 Search (2048X16) 2.665 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 amp/seg (%) 146.2 5.6 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 ph/frq (deg) 3.5 1.0 Inc. seg. avg. 5.785 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011
 amp/frq (%) 2.6 1.8 Inc. frq. avg. 2.822 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00

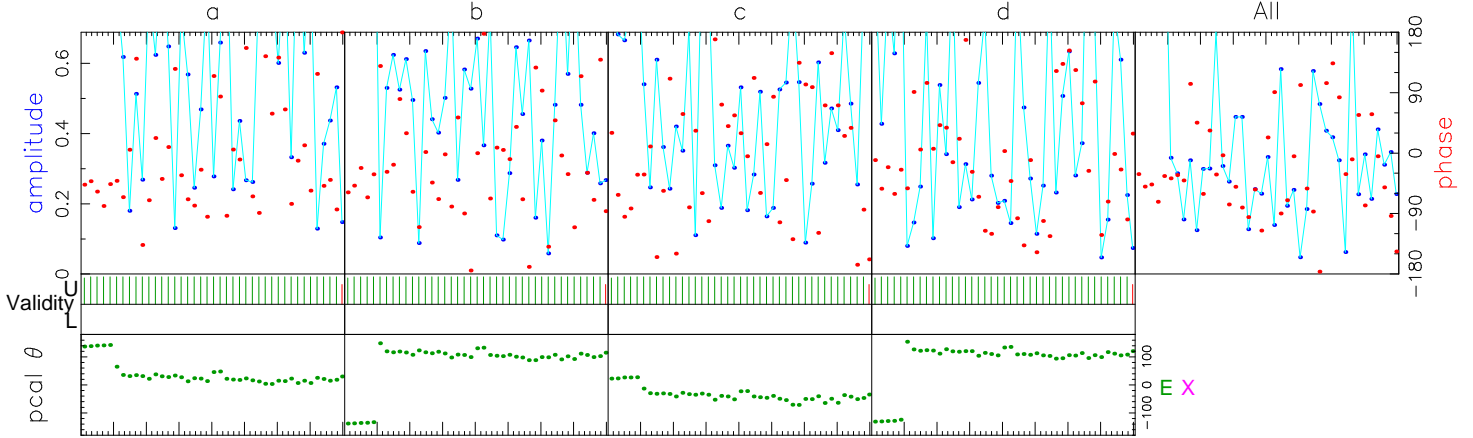
E: az 272.3 el 24.5 pa 42.6 X: az 273.4 el 21.8 pa 34.9 u,v (fr/asec) 747.104 -802.789 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EX..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EX.W.146.zrmosn



Fringe quality 9
 SNR 9.3
 Int time 478.934
 Amp 0.230
 Phase -41.9
 PFD 4.0e-12
 Delays (us)
 SBD -0.007516
 MBD -0.007222
 Fringe rate (Hz) 0.002703
 Ion TEC 0.000
 Ref freq (MHz) 86140.0000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004500.51
 Stop 005300.26
 FRT 004900.00
 Corr/FF/build 2017:237:075717
 2017:243:164208
 2017:170:130423
 RA & Dec (J2000) 08h54m48.8749s +20°06'30.641"



Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec

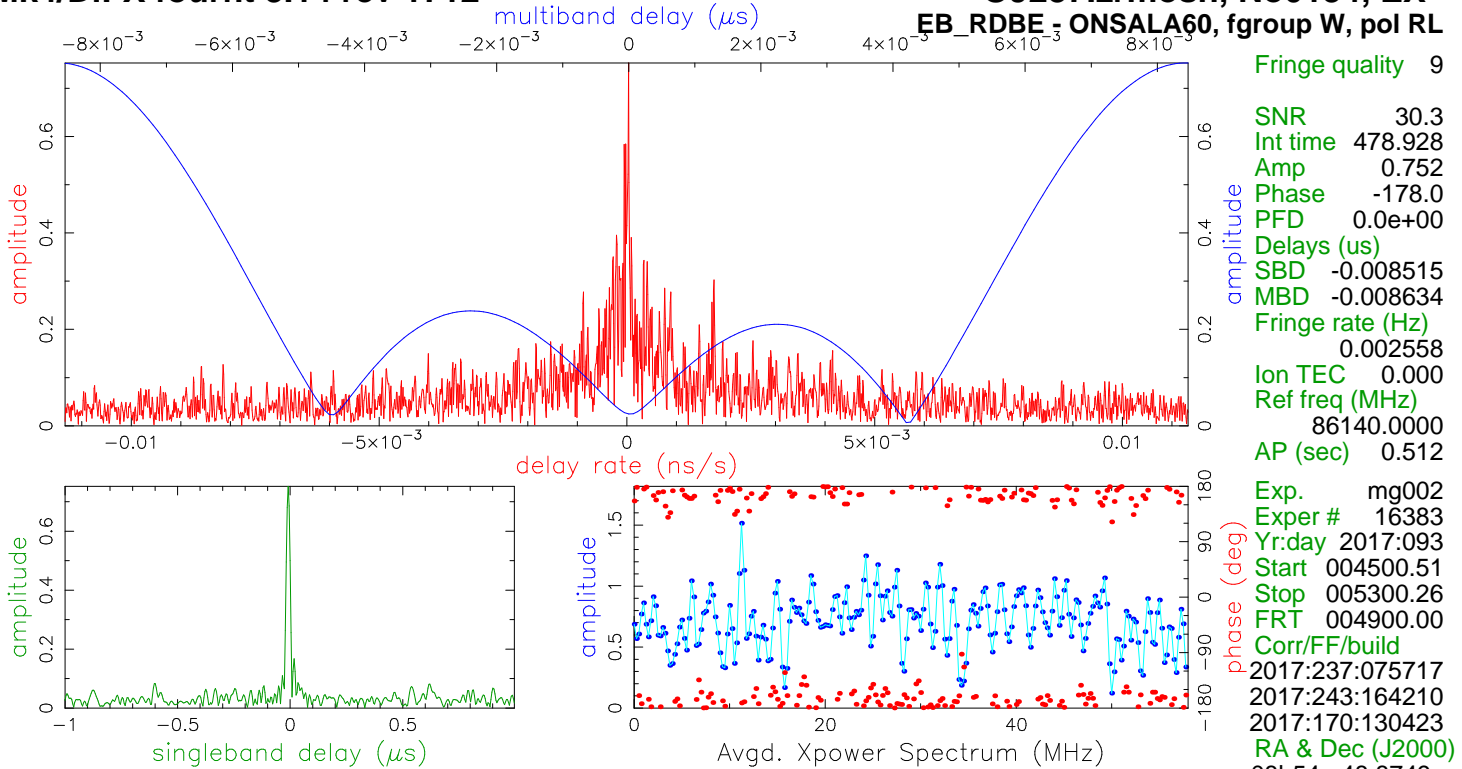


	86151.11	86209.70	86268.30	86326.89	86385.48	All
U/L	937/0	937/0	937/0	937/0	937/0	231.3
E	3890	296	1703	3109	3109	
X	0	0	0	0	0	
E:X	0:0	0:0	0:0	0:0	0:0	
E:X	0:0	0:0	0:0	0:0	0:0	
E	1000	1000	1000	1000	1000	
X	1000	1000	1000	1000	1000	
E	W00UL	W01UL	W02UL	W03UL	W04UL	
X	W00UR	W01UR	W02UR	W03UR	W04UR	

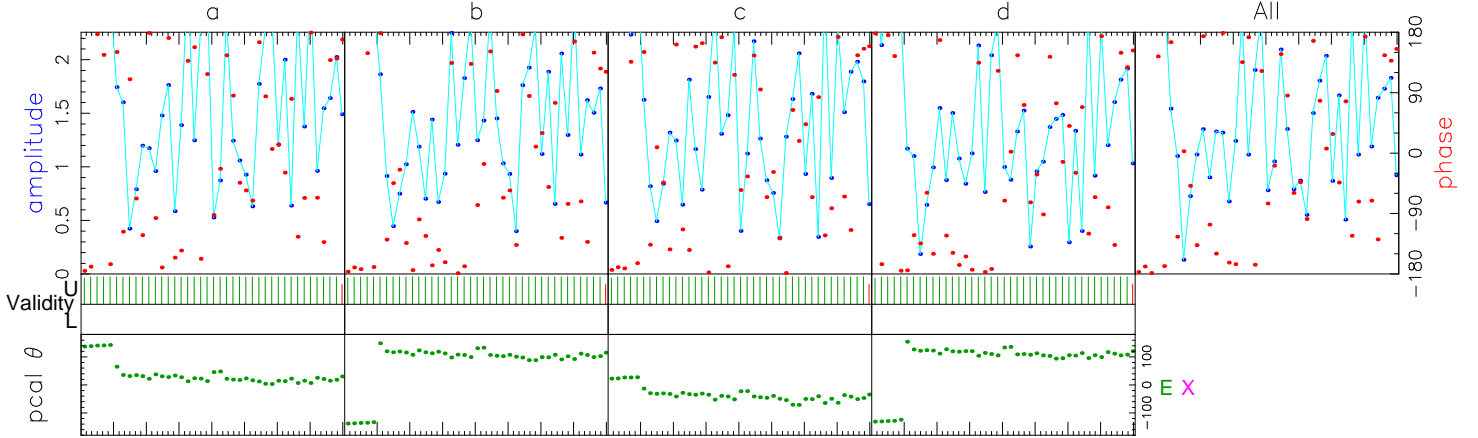
	86151.11	86209.70	86268.30	86326.89	86385.48	All
Group delay (usec)(sbd)	8.89374779877E+02	8.89374485850E+02	8.89382001712E+02	8.89382001712E+02	8.89382001712E+02	-7.22184E-03 +/- 2.6E-04
Sband delay (usec)	8.89374485850E+02	8.8938200360E+02	8.89382001712E+02	8.89382001712E+02	8.89382001712E+02	-7.51586E-03 +/- 1.0E-03
Phase delay (usec)	8.8938200360E+02	-1.24599186780E-01	-3.1275907E-07	-3.1275907E-07	-3.1275907E-07	-1.35208E-06 +/- 4.0E-07
Delay rate (us/s)	-1.24599186780E-01		-1.24599218162E-01	-1.24599218162E-01	-1.24599218162E-01	3.13820E-08 +/- 1.4E-09
Total phase (deg)		184.0				-41.9 +/- 12.4

	86151.11	86209.70	86268.30	86326.89	86385.48	All
ph/seg (deg)	73.2	39.7	73.2	73.2	73.2	-1.000 1.000
amp/seg (%)	127.9	69.2	127.9	127.9	127.9	-0.009 0.009
ph/frq (deg)	14.0	12.4	14.0	14.0	14.0	-0.011 0.011
amp/frq (%)	36.7	21.6	36.7	36.7	36.7	0.00 0.00

E: az 272.3 el 24.5 pa 42.6 X: az 273.4 el 21.8 pa 34.9 u,v (fr/asec) 747.104 -802.789 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EX..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EX.W.147.zrmosn



Amp. and Phase vs. time for each freq., 41 segs, 23 APs / seg (11.78 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	86385.48	All
86151.11	-179.9	-174.2	-178.9	-178.7	-178.0	-178.0
0.8	0.7	0.7	0.7	0.7	0.8	
231.3	231.0	231.0	231.0	230.6	231.0	
U/L	937/0	937/0	937/0	937/0		
E	3890	296	1703	3109		
X	0	0	0	0		
E:X	0:0	0:0	0:0	0:0		
E:X	0:0	0:0	0:0	0:0		
E	1000	1000	1000	1000		
X	1000	1000	1000	1000		
E	W00UR	W01UR	W02UR	W03UR		
X	W00UL	W01UL	W02UL	W03UL		
Group delay (usec)(sbd)	8.89373367917E+02		Apriori delay (usec)	8.89382001712E+02	Resid mbdelay (usec)	-8.63380E-03 +/- 8.0E-05
Sband delay (usec)	8.89373486678E+02		Apriori clock (usec)	2.5330647E+01	Resid sbdelay (usec)	-8.51503E-03 +/- 3.1E-04
Phase delay (usec)	8.89381995972E+02		Apriori clockrate (us/s)	-3.1275907E-07	Resid phdelay (usec)	-5.73961E-06 +/- 1.2E-07
Delay rate (us/s)	-1.24599188467E-01		Apriori rate (us/s)	-1.24599218162E-01	Resid rate (us/s)	2.96942E-08 +/- 4.4E-10
Total phase (deg)		47.9	Apriori accel (us/s/s)	-7.32617409997E-06	Resid phase (deg)	-178.0 +/- 3.8

RMS Theor. Amplitude 0.752 +/- 0.025 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5

ph/seg (deg) 82.9 12.1 Search (2048X16) 0.721 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000

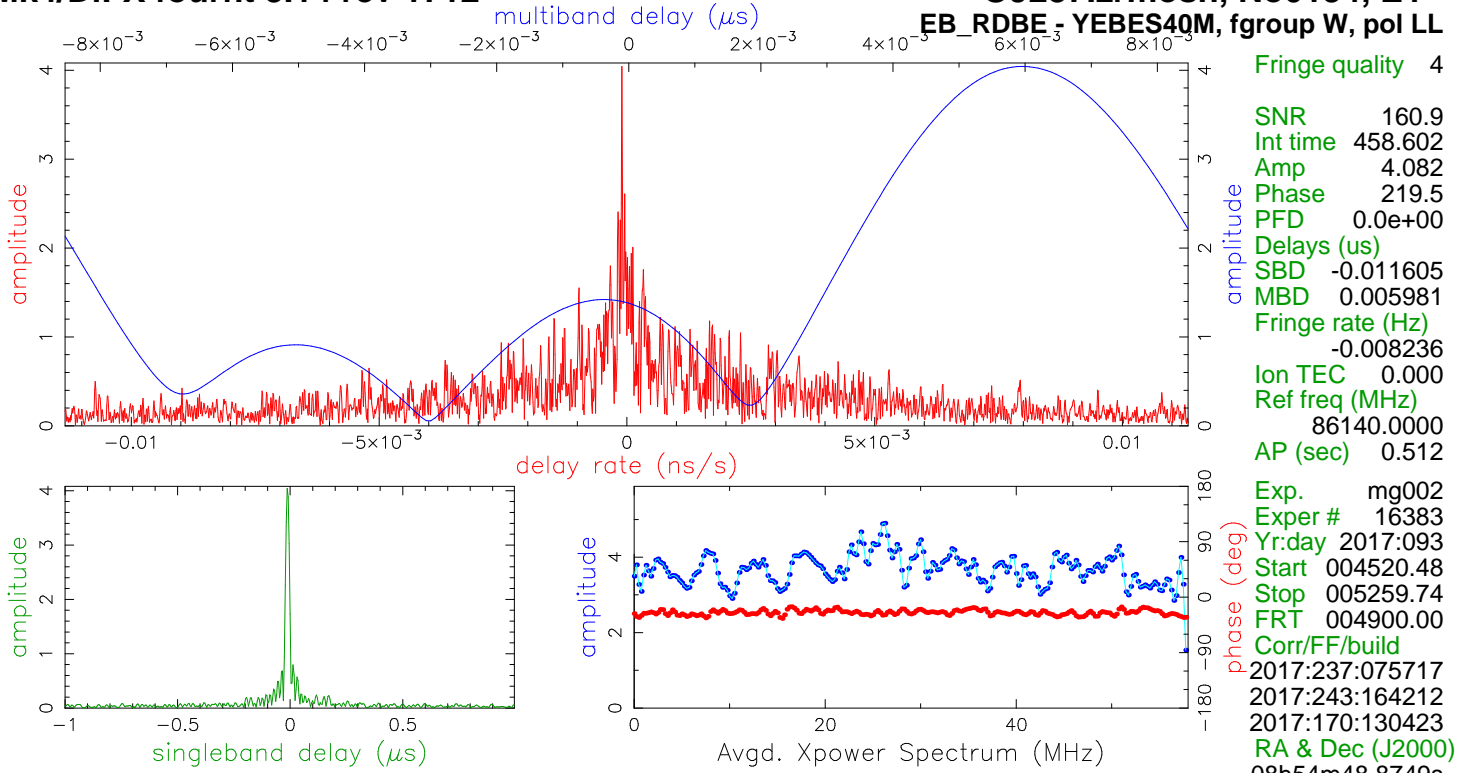
amp/seg (%) 136.2 21.1 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009

ph/frq (deg) 3.1 3.8 Inc. seg. avg. 1.475 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011

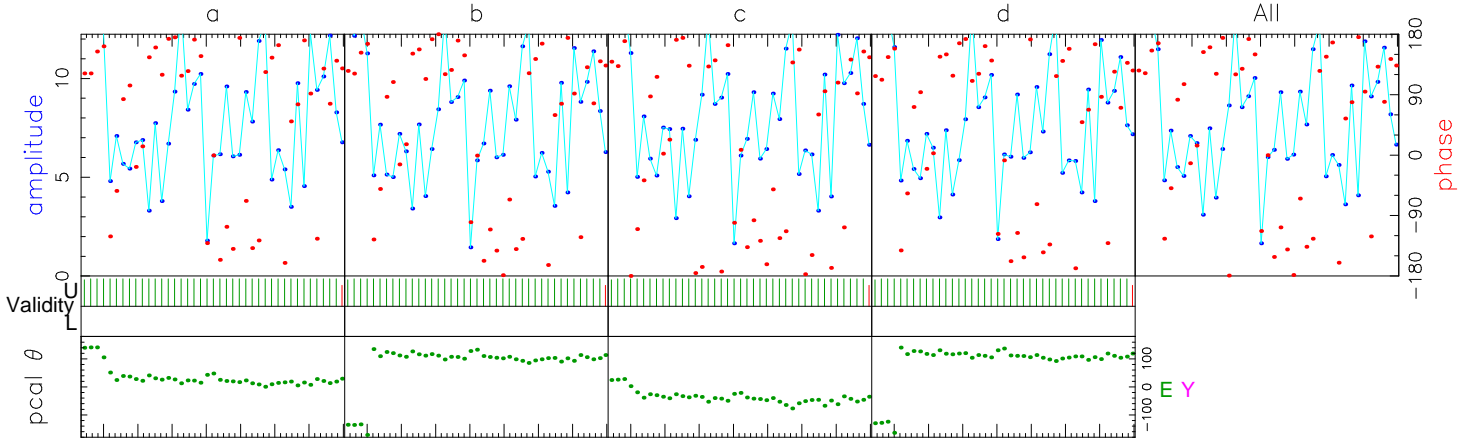
amp/frq (%) 5.1 6.6 Inc. frq. avg. 0.751 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00

E: az 272.3 el 24.5 pa 42.6 X: az 273.4 el 21.8 pa 34.9 u,v (fr/asec) 747.104 -802.789 simultaneous interpolator

Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EX..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EX.W.148.zrmosn



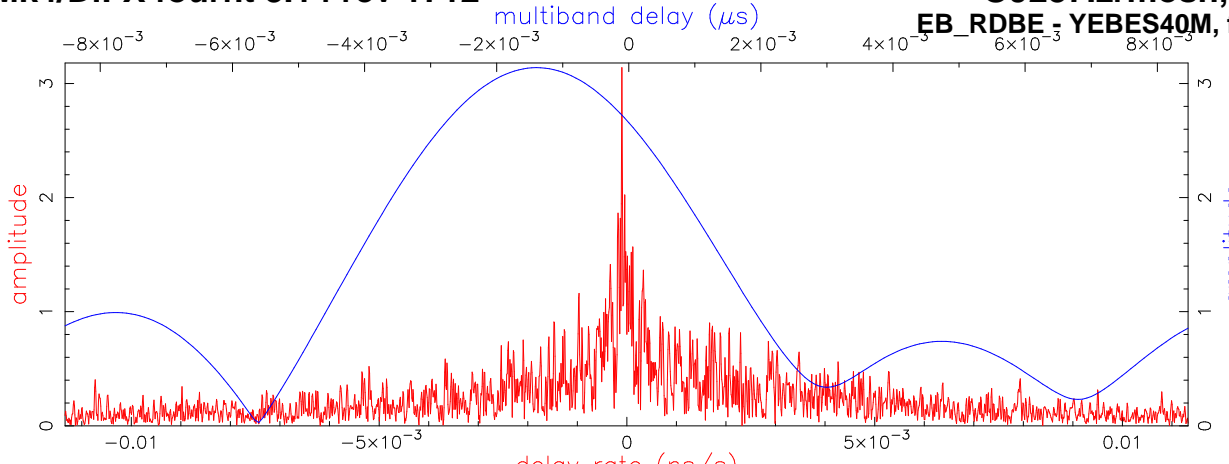
Amp. and Phase vs. time for each freq., 41 segs, 22 APs / seg (11.26 sec / seg.), time ticks 10 sec



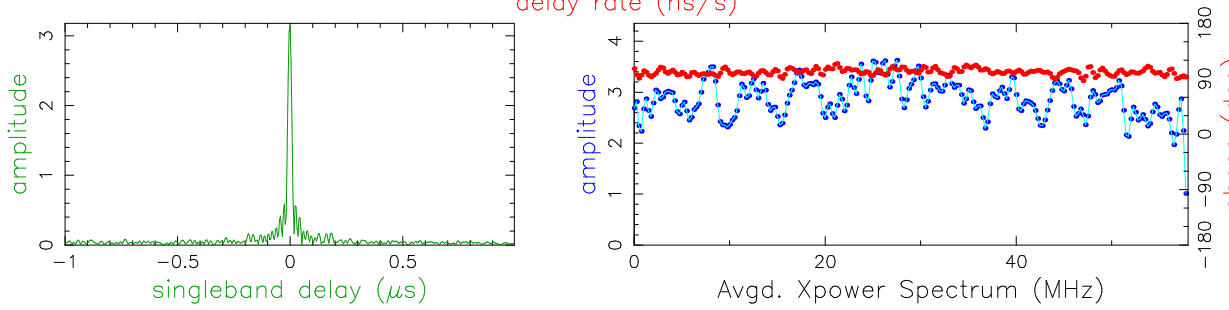
	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	897/0	897/0	897/0	897/0	APs used	230.3
E	3890	296	1703	3109	PC freqs	
Y	0	0	0	0	PC phase	
E:Y	0:0	0:0	0:0	0:0	Mani PC	
E:Y	0:0	0:0	0:0	0:0	PC amp	
E	1000	1000	1000	1000	Chan ids	
Y	1000	1000	1000	1000	Tracks	
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
Y	W00UL	W01UL	W02UL	W03UL	Tracks	
Group delay (usec)(sbd)	-2.16858031985E+03	Apriori delay (usec)	-2.16856923375E+03	Resid mbdelay (usec)	5.98057E-03	+/- 1.5E-05
Sband delay (usec)	-2.16858083899E+03	Apriori clock (usec)	2.4350113E+01	Resid sbdelay (usec)	-1.16052E-02	+/- 5.9E-05
Phase delay (usec)	-2.16856922887E+03	Apriori clockrate (us/s)	-4.5787034E-07	Resid phdelay (usec)	4.87775E-06	+/- 2.3E-08
Delay rate (us/s)	1.15882118652E-01	Apriori rate (us/s)	1.15882214269E-01	Resid rate (us/s)	-9.56170E-08	+/- 8.7E-11
Total phase (deg)		Apriori accel (us/s/s)	1.63856496890E-05	Resid phase (deg)	219.5	+/- 0.7

RMS Theor. Amplitude 4.082 +/- 0.025 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 ph/seg (deg) 71.9 2.3 Search (2048X16) 3.751 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 amp/seg (%) 121.5 4.0 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 ph/frq (deg) 11.6 0.7 Inc. seg. avg. 7.966 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011
 amp/frq (%) 1.5 1.2 Inc. frq. avg. 4.085 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00

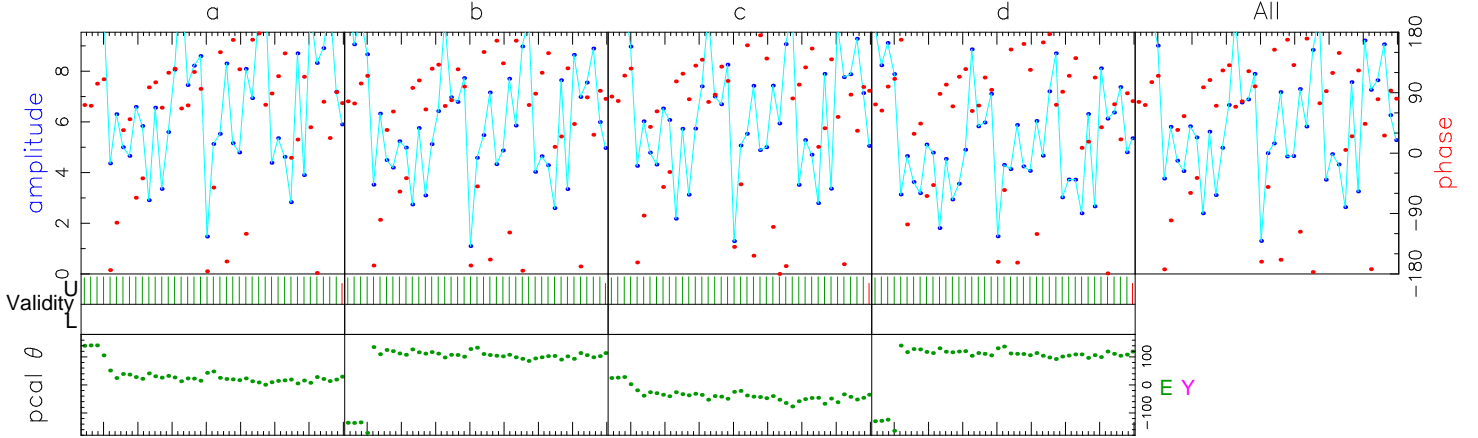
E: az 272.3 el 24.5 pa 42.6 Y: az 270.5 el 31.2 pa 54.0 u,v (fr/asec) -678.321 1491.219 simultaneous interpolator
 Control file: cf_1234 Input file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EY..zrmosn Output file: /Exps/mg002/gmva_58_merged_pc1/1234/No0134/EY.W.149.zrmosn



Fringe quality 5
 SNR 125.4
 Int time 458.602
 Amp 3.180
 Phase 99.8
 PFD 0.0e+00
 Delays (us)
 SBD -0.001564
 MBD -0.001410
 Fringe rate (Hz)
 -0.008224
 Ion TEC 0.000
 Ref freq (MHz)
 86140.0000
 AP (sec) 0.512
 Exp. mg002
 Exper # 16383
 Yr:day 2017:093
 Start 004520.48
 Stop 005259.74
 FRT 004900.00
 Corr/FF/build
 2017:237:075717
 2017:243:164215
 2017:170:130423
 RA & Dec (J2000)
 08h54m48.8749s
 +20°06'30.641"

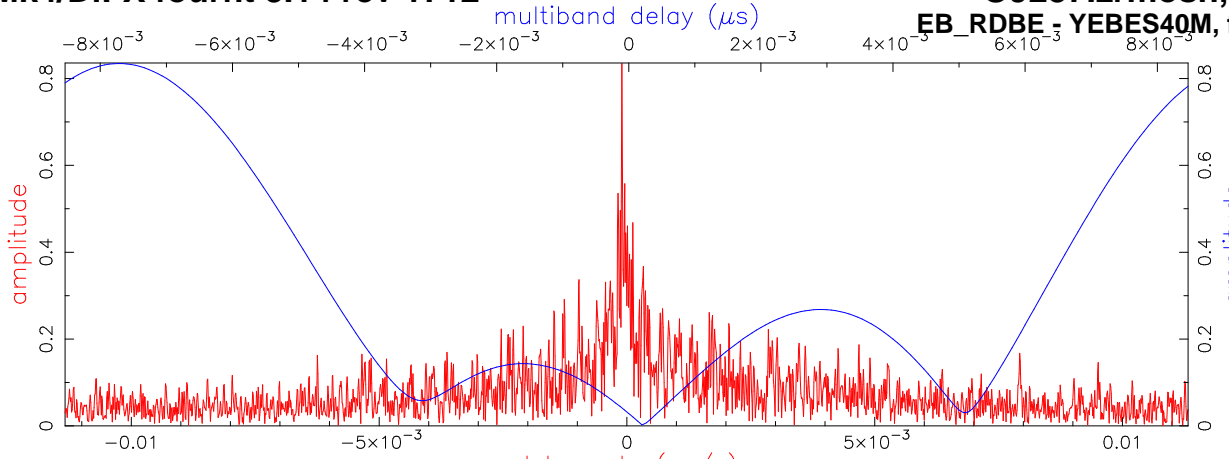


Amp. and Phase vs. time for each freq., 41 segs, 22 APs / seg (11.26 sec / seg.), time ticks 10 sec



	86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
U/L	897/0	897/0	897/0	897/0	APs used	
E	3890	296	1703	3109	PC freqs	
Y	0	0	0	0	PC freqs	
E:Y	0:0	0:0	0:0	0:0	PC phase	
E:Y	0:0	0:0	0:0	0:0	Mani PC	
E	1000	1000	1000	1000	PC amp	
Y	1000	1000	1000	1000		
E	W00UL	W01UL	W02UL	W03UL	Chan ids	
Y	W00UR	W01UR	W02UR	W03UR	Tracks	
					Chan ids	
					Tracks	
Group delay (usec)(sbd)	-2.16857064373E+03	Apriori delay (usec)	-2.16856923375E+03	Resid mbdelay (usec)	-1.40998E-03	+/- 1.9E-05
Sband delay (usec)	-2.16857079734E+03	Apriori clock (usec)	2.4350113E+01	Resid sbdelay (usec)	-1.56359E-03	+/- 7.6E-05
Phase delay (usec)	-2.16856923053E+03	Apriori clockrate (us/s)	-4.5787034E-07	Resid phdelay (usec)	3.21939E-06	+/- 2.9E-08
Delay rate (us/s)	1.15882118801E-01	Apriori rate (us/s)	1.15882214269E-01	Resid rate (us/s)	-9.54675E-08	+/- 1.1E-10
Total phase (deg)		Apriori accel (us/s/s)	1.63856496890E-05	Resid phase (deg)	99.8	+/- 0.9

RMS Theor. Amplitude 3.180 +/- 0.025 Pcal mode: MANUAL, MANUAL PC period (AP's) 5, 5
 ph/seg (deg) 71.6 2.9 Search (2048X16) 2.923 Pcal rate: 0.000E+00, 0.000E+00 (us/s) sb window (us) -1.000 1.000
 amp/seg (%) 121.7 5.1 Interp. 0.000 Bits/sample: 2x2 SampCntNorm: enabled mb window (us) -0.009 0.009
 ph/frq (deg) 8.3 0.9 Inc. seg. avg. 6.208 Sample rate(MSamp/s): 116 dr window (ns/s) -0.011 0.011
 amp/frq (%) 10.7 1.6 Inc. frq. avg. 3.155 Data rate(Mb/s): 928 nlags: 232 t_cohere infinite ion window (TEC) 0.00 0.00



Fringe quality 7

SNR 33.0

Int time 458.597

Amp 0.836

Phase 75.7

PFD 0.0e+00

Delays (us)

SBD -0.008108

MBD -0.007711

Fringe rate (Hz) -0.008155

Ion TEC 0.000

Ref freq (MHz) 86140.0000

AP (sec) 0.512

Exp. mg002

Exper # 16383

Yr:day 2017:093

Start 004520.48

Stop 005259.74

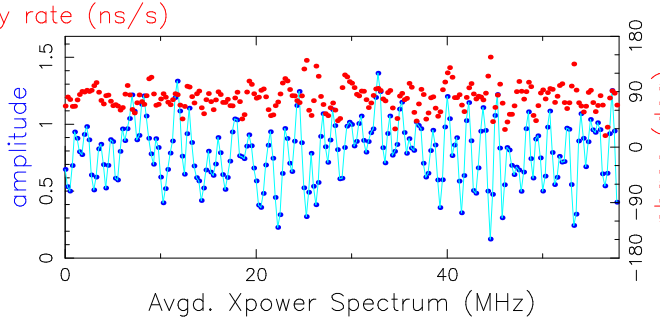
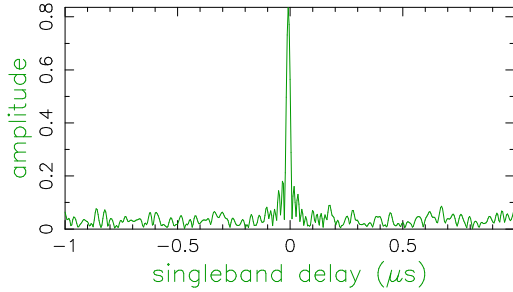
FRT 004900.00

Corr/FF/build 2017:237:075717

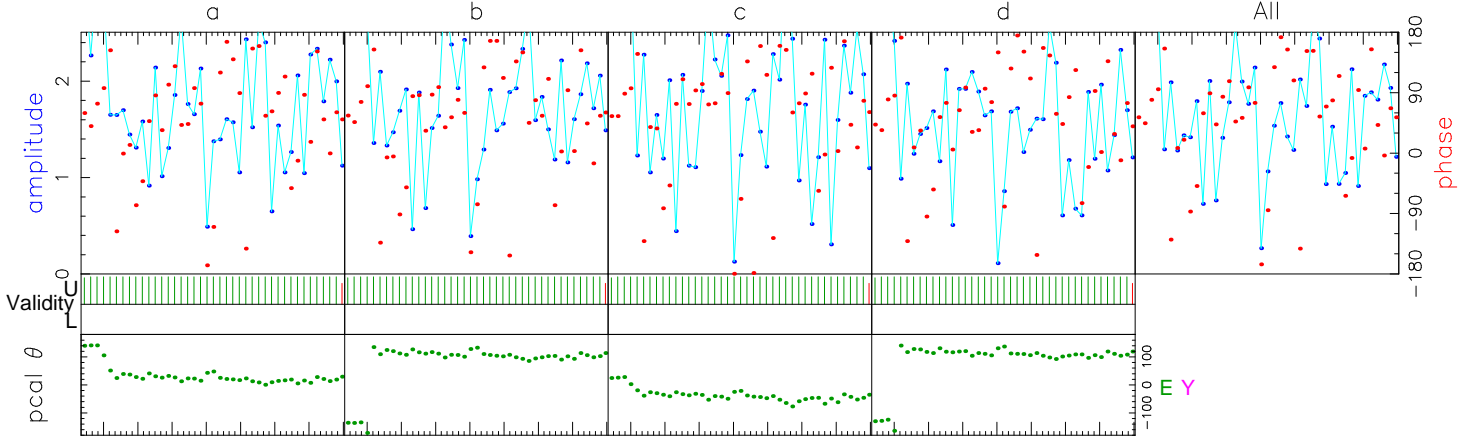
2017:243:164217

2017:170:130423

RA & Dec (J2000) 08h54m48.8749s +20°06'30.641"



Amp. and Phase vs. time for each freq., 41 segs, 22 APs / seg (11.26 sec / seg.), time ticks 10 sec



86151.11	86209.70	86268.30	86326.89	Freq (MHz)	All
74.5	71.8	87.7	67.8	Phase	75.7
0.8	0.9	0.9	0.8	Ampl.	0.8
231.2	231.1	231.3	230.8	Sbd box	231.1
U/L 897/0	897/0	897/0	897/0	APs used	
E 3890	296	1703	3109	PC freqs	
Y 0	0	0	0	PC freqs	
E:Y 0:0	0:0	0:0	0:0	PC phase	
E:Y 0:0	0:0	0:0	0:0	Mani PC	
E 1000	1000	1000	1000	PC amp	
Y 1000	1000	1000	1000		
E W00UR	W01UR	W02UR	W03UR	Chan ids	
Y W00UL	W01UL	W02UL	W03UL	Tracks	
				Chan ids	
				Tracks	

Group delay (usec)(sbd)	-2.16857694434E+03	Apriori delay (usec)	-2.16856923375E+03	Resid mbdelay (usec)	-7.71059E-03	+/-	7.4E-05
Sband delay (usec)	-2.16857734134E+03	Apriori clock (usec)	2.4350113E+01	Resid sbdelay (usec)	-8.10759E-03	+/-	2.9E-04
Phase delay (usec)	-2.16856923131E+03	Apriori clockrate (us/s)	-4.5787034E-07	Resid phdelay (usec)	2.44223E-06	+/-	1.1E-07
Delay rate (us/s)	1.15882119595E-01	Apriori rate (us/s)	1.15882214269E-01	Resid rate (us/s)	-9.46732E-08	+/-	4.2E-10
Total phase (deg)	-210.6	Apriori accel (us/s/s)	1.63856496890E-05	Resid phase (deg)	75.7	+/-	3.5

ph/seg (deg)	RMS 74.4	Theor. 11.1	Amplitude 11.1	Search (2048X16) 0.760	0.836 +/- 0.025	Pcal mode: MANUAL, MANUAL	PC period (AP's) 5, 5	sb window (us)	-1.000	1.000	
amp/seg (%)	130.8	19.4	Interp. 0.000	0.000	0.000	Pcal rate: 0.000E+00, 0.000E+00 (us/s)	SampCntNorm: enabled	mb window (us)	-0.009	0.009	
ph/frq (deg)	10.6	3.5	Inc. seg. avg. 1.690	1.690	1.690	Bits/sample: 2x2	Sample rate(MSamp/s): 116	dr window (ns/s)	-0.011	0.011	
amp/frq (%)	6.0	6.1	Inc. frq. avg. 0.840	0.840	0.840	Data rate(Mb/s): 928	nlags: 232	t_cohere infinite	ion window (TEC)	0.00	0.00

