



17702 - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolved imaging

Cycle: 32, Proposal Category: GO

(Availability Mode: SUPPORTED)

INVESTIGATORS

<i>Name</i>	<i>Institution</i>
Dr. Simon Gazagnes (PI) (Contact)	University of Texas at Austin
Prof. Matthew James Hayes (CoI) (ESA Member)	Stockholm University
Prof. Claudia Scarlata (CoI)	University of Minnesota - Twin Cities
Dr. Jeremy Blaizot (CoI) (ESA Member)	Centre de Recherche Astrophysique de Lyon
Dr. Thibault Garel (CoI) (ESA Member)	University of Geneva, Department of Astronomy
Prof. Anne Verhamme (CoI) (ESA Member)	University of Geneva, Department of Astronomy
Dr. Floriane Leclercq (CoI) (ESA Member)	Centre de Recherche Astrophysique de Lyon
Mr. Valentin Mauerhofer (CoI) (ESA Member)	University of Geneva, Department of Astronomy
Dr. Nika Jurlin (CoI)	University of Texas at Austin
Dr. Danielle Berg (CoI) (Contact)	University of Texas at Austin
Prof. John Chisholm (CoI)	University of Texas at Austin
Dr. Matilde Mingozi (CoI) (ESA Member)	Space Telescope Science Institute - ESA - JWST

VISITS

<i>Visit</i>	<i>Targets used in Visit</i>	<i>Configurations used in Visit</i>	<i>Orbits Used</i>	<i>Last Orbit Planner Run</i>	<i>OP Current with Visit?</i>
01	(1) J1253-0312	ACS/SBC	2	27-Feb-2026 14:00:16.0	yes
02	(2) J1325-1136	ACS/SBC	2	27-Feb-2026 14:00:16.0	yes
10	(2) J1325-1136	ACS/SBC	2	27-Feb-2026 14:00:17.0	yes

<i>Visit</i>	<i>Targets used in Visit</i>	<i>Configurations used in Visit</i>	<i>Orbits Used</i>	<i>Last Orbit Planner Run</i>	<i>OP Current with Visit?</i>
08	(3) J0947+4138	ACS/SBC	2	27-Feb-2026 14:00:17.0	yes
09	(3) J0947+4138	ACS/SBC	2	27-Feb-2026 14:00:18.0	yes
04	(3) J0947+4138	ACS/SBC	2	27-Feb-2026 14:00:18.0	yes
12	(3) J0947+4138	ACS/SBC	2	27-Feb-2026 14:00:18.0	yes
11	(3) J0947+4138	ACS/SBC	1	27-Feb-2026 14:00:19.0	yes
05	(4) J1202+5416	ACS/SBC	2	27-Feb-2026 14:00:19.0	yes
06	(4) J1202+5416	ACS/SBC	2	27-Feb-2026 14:00:20.0	yes
13	(4) J1202+5416	ACS/SBC	2	27-Feb-2026 14:00:20.0	yes
07	(5) J1331+4151	ACS/SBC	2	27-Feb-2026 14:00:20.0	yes
14	(5) J1331+4151	ACS/SBC	2	27-Feb-2026 14:00:21.0	yes

25 Total Orbits Used

ABSTRACT

The synergy between Lyman-alpha and C IV 1548,50Å is among our most promising UV diagnostics for understanding the escape of ionizing photons across all energy levels. Ly α probes the properties of low-ionization gas (~ 13.6 eV), while C IV probes higher-energy levels (>54 eV), corresponding to photons capable of ionizing two hydrogen atoms each. Notably, both HST and JWST observations have uncovered targets with significant C IV emissions in galaxies at redshifts around 5--11. Thus, to disentangle the role of star-forming galaxies in the overall ionizing budget across various energy levels, our models must reproduce both the Ly α and C IV emissions.

Recent low- z observations of C IV and Ly α emitters have revealed intriguing trends: galaxies with substantial C IV emission tend to exhibit larger damped Lyman-alpha absorption, whereas those with prominent Ly α emission often display weak or no C IV absorption. This contrasting behavior challenges our current understanding of the interplay between hard ionizing fields and the escape of ionizing photons. It suggests that galaxies with hard ionizing sources may not significantly contribute to reionization due to being embedded in large opaque H I clouds.

Here, we propose 25 orbits of HST ACS/SBC observations to spatially resolve the Ly α , C IV, and UV emission in a sample of 8 star-forming galaxies at a redshift ~ 0 . Four galaxies exhibit strong C IV emission and damped Ly α absorption and four have weak C IV emission and dominant Ly α emission. The requested observations are essential for improving our understanding of the Ly α and C IV synergy and determining the contribution of C IV emitting galaxies to reionization.

OBSERVING DESCRIPTION

The goal of this proposal is to map and compare the morphology of the Ly α , C iv, and UV continuum with a spatial resolution down to 10 pc in a sample of eight local star-forming galaxies (including 3 archival) with weak and strong Ly α and C iv emission using HST ACS/SBC.

We request ACS/SBC F125LP, F140LP, F150LP and F165LP to cover Ly α , FUV continuum, the CIV 1548,51 and also the HeII1640+[OIII]1661, emission lines.

We expect that the targeted emission will be well captured in one pointing of the ACS/SBC (34.6"x30") with sufficient space for background subtraction.

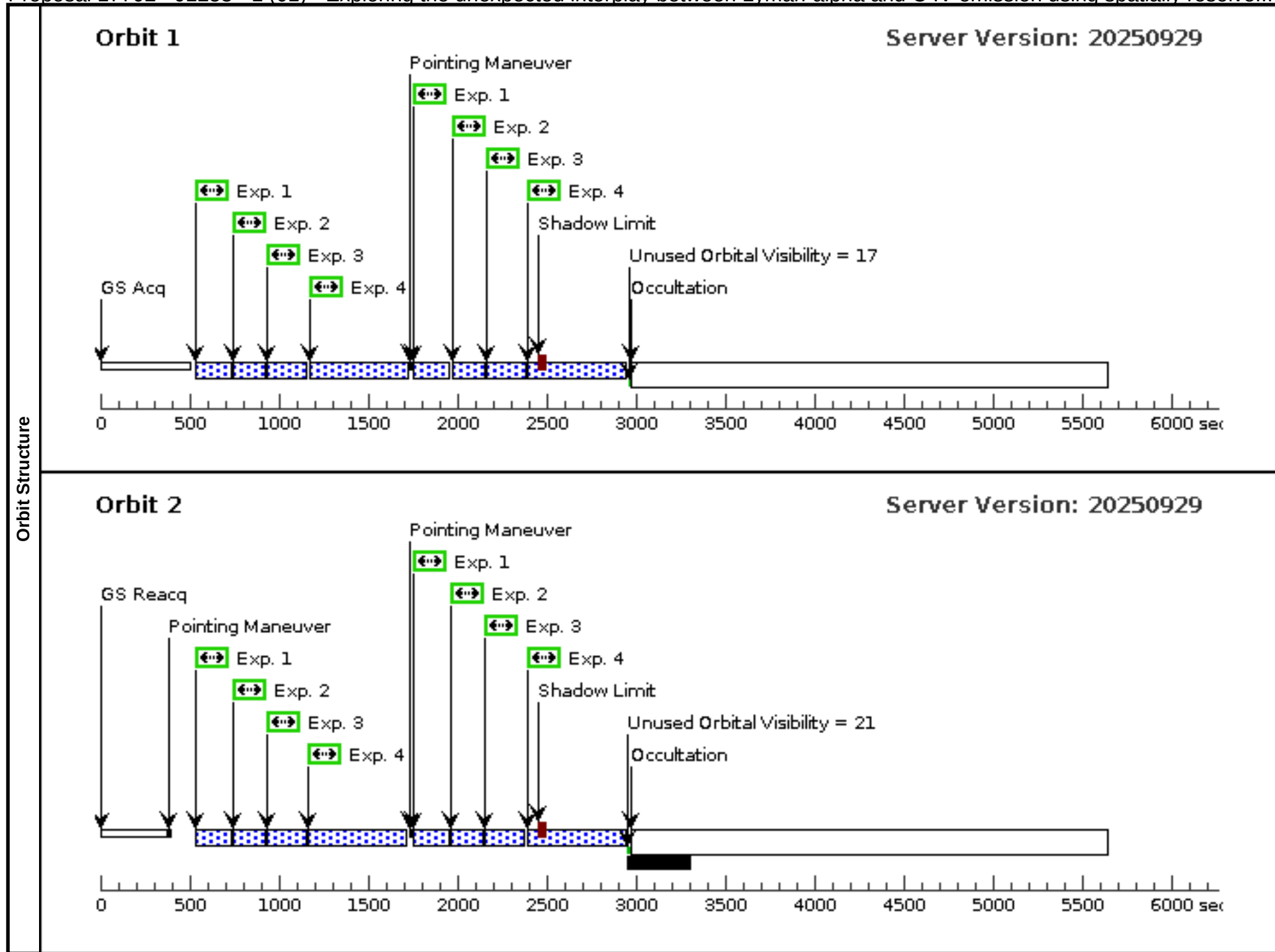
ETCs: To estimate exposure times, we took advantage of each target's archival COS spectrum, from which we measured the stellar continuum and emission line surface brightnesses in the COS aperture (2.5"x2.5"). We used these values as input for the ACS Exposure Time Calculators (ETC). We assumed that the targeted line emission is coming from an extended region with an aperture of 2.5".

ACS/SBC observations:

We request SHADOW for the F125LP filter to mitigate the bright geocoronal Ly-alpha emission and geocoronal line OI1302. We used the ACS-SBC-DITHER-BOX pattern for all exposures.

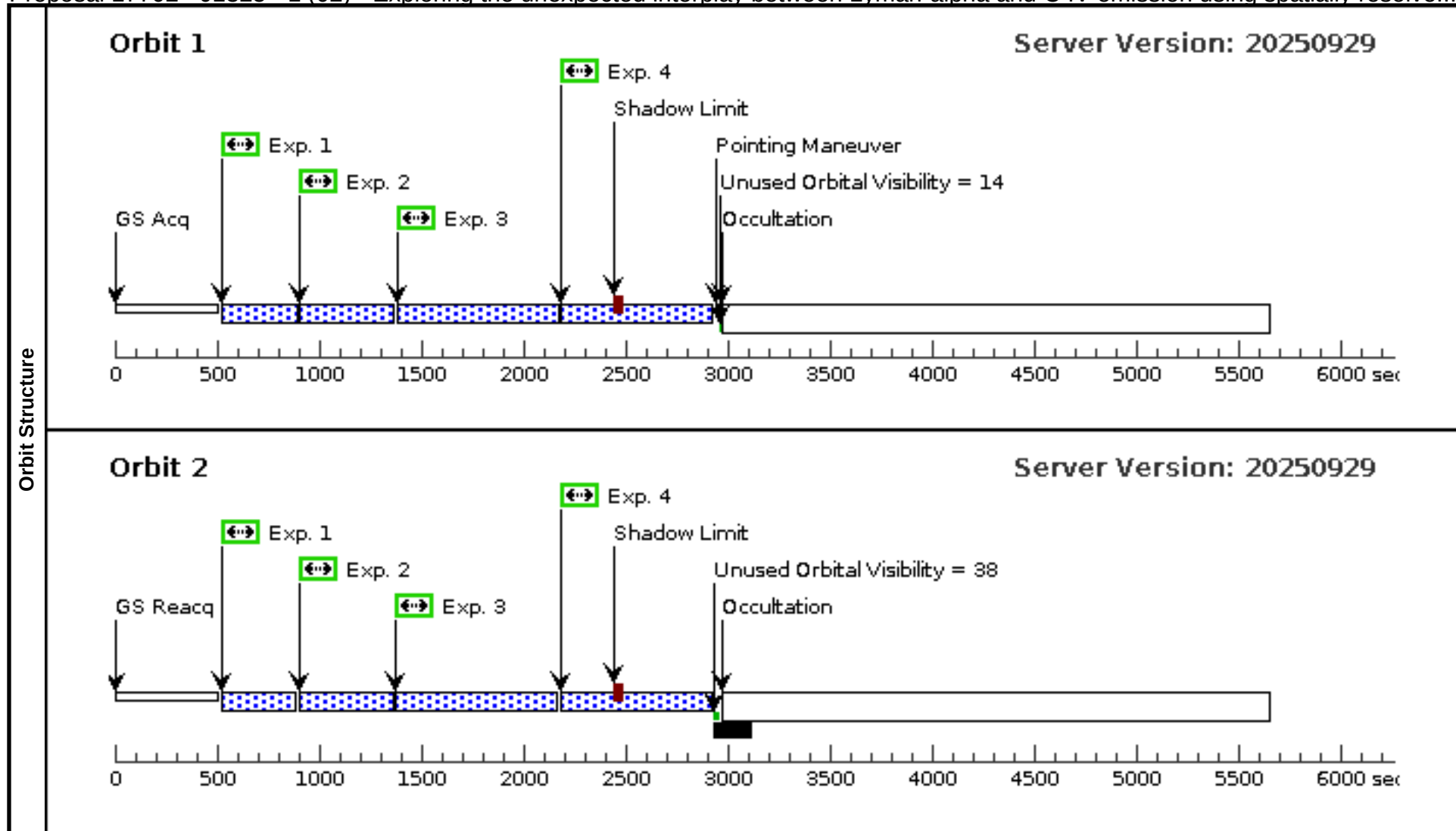
Proposal 17702 - J1253 - 1 (01) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J1253 - 1 (01), completed										Fri Feb 27 19:00:21 GMT 2026			
	Diagnostic Status: Informational													
	Scientific Instruments: ACS/SBC													
	Special Requirements: (none)													
Diagnostics	(J1253 - 1 (01)) Informational (Form): APT cannot model timing accurately, contact your assigned Program Coordinator.													
Patterns	#	Primary Pattern				Secondary Pattern				Exposures				
	(1)	Pattern Type=ACS-SBC-DITHER-BOX Purpose=DITHER Number Of Points=4 Point Spacing=0.179 Line Spacing=0.116				Coordinate Frame=POS-TARG Pattern Orientation=20.02 Angle Between Sides=63.65 Center Pattern=false				(1-4)				
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous				
	(1)	J1253-0312		RA: 12 53 5.9600 (193.2748333d) Dec: -03 12 58.84 (-3.21634d) Equinox: J2000				V=15.85		Reference Frame: ICRS				
	Comments: Category=GALAXY Description=[STARBURST]													
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit		
	1	F125-LP (1906441)	(1) J1253-0312	ACS/SBC, ACCUM, SBC-FIX		F125LP		SHADOW	Pattern 1, Exps 1-4 in J1253 - 1 (01) (1)	135 Secs (540 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]				
										[==>(Pattern 3)]				
	2	F140-LP (1906448)	(1) J1253-0312	ACS/SBC, ACCUM, SBC-FIX		F140LP			Pattern 1, Exps 1-4 in J1253 - 1 (01) (1)	130 Secs (520 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]				
										[==>(Pattern 3)]				
	3	F150-LP (1906455)	(1) J1253-0312	ACS/SBC, ACCUM, SBC-FIX		F150LP			Pattern 1, Exps 1-4 in J1253 - 1 (01) (1)	175 Secs (700 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]				
										[==>(Pattern 3)]				
	4	F165-LP (1906462)	(1) J1253-0312	ACS/SBC, ACCUM, SBC-FIX		F165LP			Pattern 1, Exps 1-4 in J1253 - 1 (01) (1)	505 Secs (2020 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]				
										[==>(Pattern 3)]				
								[==>(Pattern 4)]		[2]				



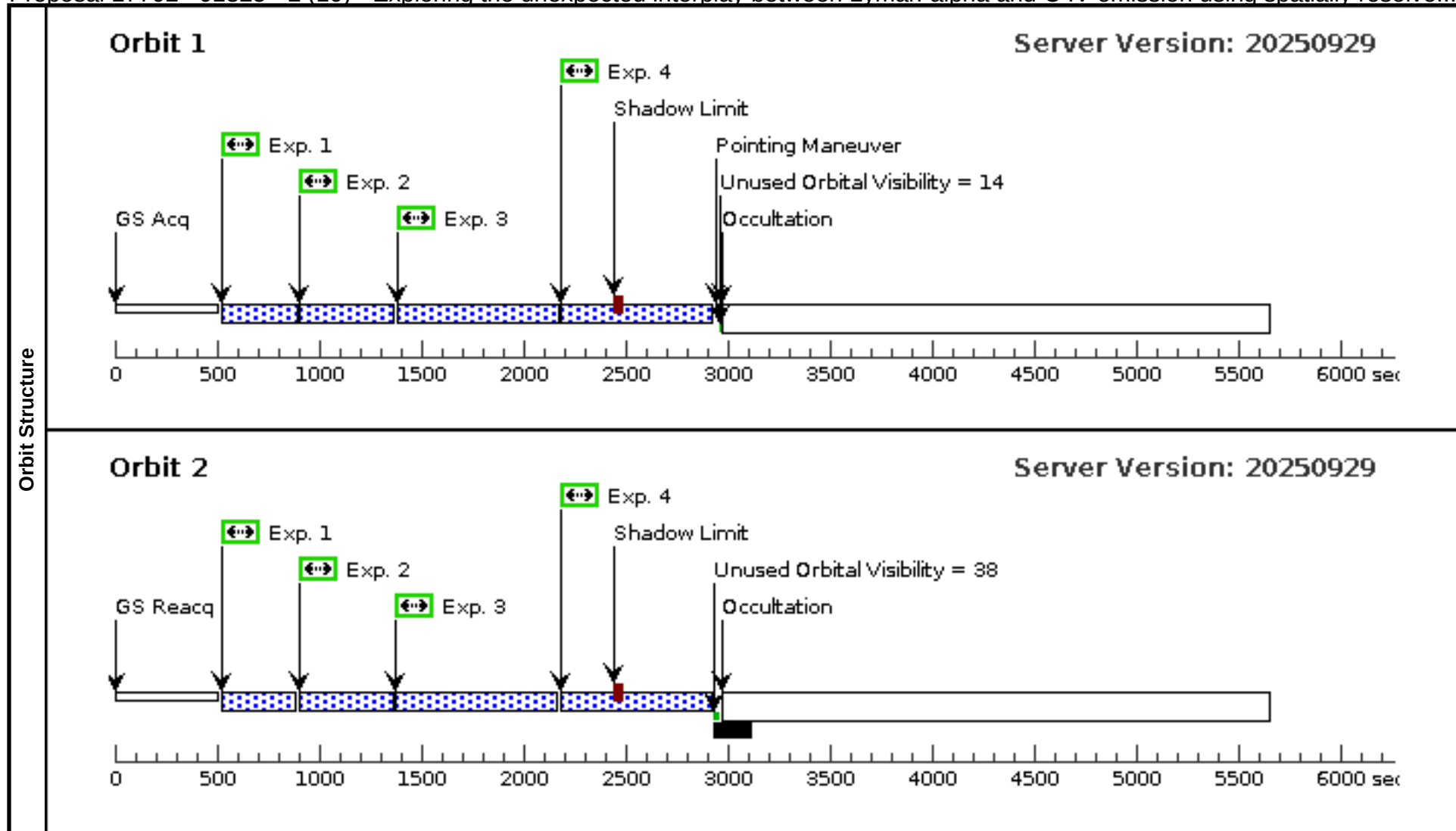
Proposal 17702 - J1325 - 1 (02) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J1325 - 1 (02), completed										Fri Feb 27 19:00:21 GMT 2026				
	Diagnostic Status: Informational														
	Scientific Instruments: ACS/SBC														
	Special Requirements: (none)														
Diagnostics	(J1325 - 1 (02)) Informational (Form): APT cannot model timing accurately, contact your assigned Program Coordinator.														
Patterns	#	Primary Pattern					Secondary Pattern					Exposures			
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Purpose=DITHER Number Of Points=2 Point Spacing=0.472 Line Spacing=			Coordinate Frame=POS-TARG Pattern Orientation=44.4 Angle Between Sides= Center Pattern=false							(1-4)			
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous					
	(2)	J1325-1136		RA: 13 25 48.6413 (201.4526721d) Dec: -11 36 37.94 (-11.61054d) Equinox: J2000				V=17.43		Reference Frame: ICRS					
Comments: Category=GALAXY Description=[STARBURST]															
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit			
	1	F125-LP (1906439)	(2) J1325-1136	ACS/SBC, ACCUM, SBC-FIX		F125LP		SHADOW	Pattern 2, Exps 1-4 in J1325 - 1 (02) (2)	300 Secs (600 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
	2	F140-LP (1906445)	(2) J1325-1136	ACS/SBC, ACCUM, SBC-FIX		F140LP			Pattern 2, Exps 1-4 in J1325 - 1 (02) (2)	410 Secs (820 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
	3	F150-LP (1906452)	(2) J1325-1136	ACS/SBC, ACCUM, SBC-FIX		F150LP			Pattern 2, Exps 1-4 in J1325 - 1 (02) (2)	750 Secs (1500 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
4	F165-LP (1906460)	(2) J1325-1136	ACS/SBC, ACCUM, SBC-FIX		F165LP			Pattern 2, Exps 1-4 in J1325 - 1 (02) (2)	690 Secs (1380 Secs)						
									[==>(Pattern 1)]		[1]				
									[==>(Pattern 2)]		[2]				



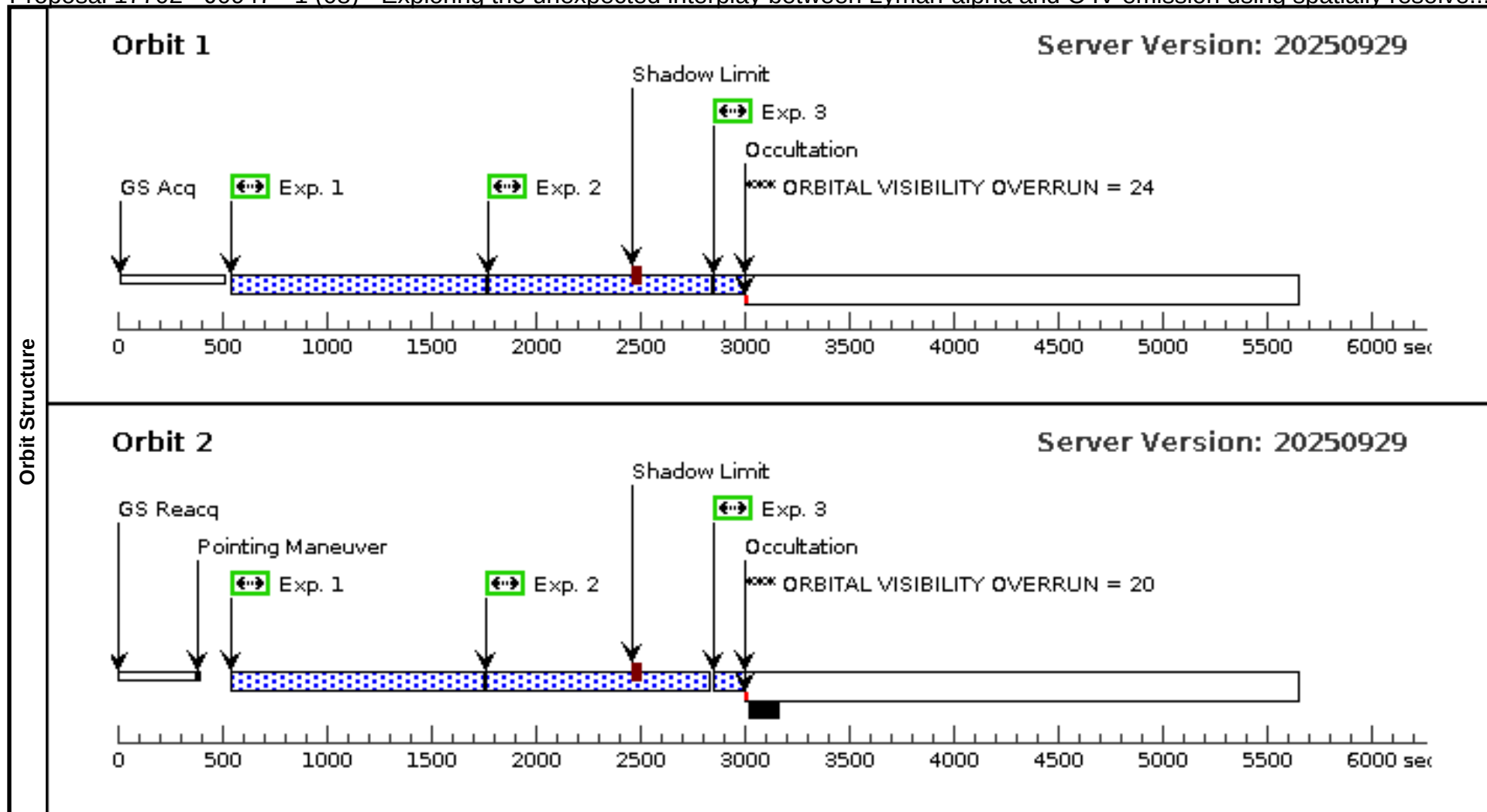
Proposal 17702 - J1325 - 2 (10) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J1325 - 2 (10), completed										Fri Feb 27 19:00:21 GMT 2026				
	Diagnostic Status: Informational														
	Scientific Instruments: ACS/SBC														
	Special Requirements: (none)														
Diagnostics	(J1325 - 2 (10)) Informational (Form): APT cannot model timing accurately, contact your assigned Program Coordinator.														
Patterns	#	Primary Pattern					Secondary Pattern					Exposures			
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Purpose=DITHER Number Of Points=2 Point Spacing=0.472 Line Spacing=			Coordinate Frame=POS-TARG Pattern Orientation=44.4 Angle Between Sides= Center Pattern=false							(1-4)			
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous					
	(2)	J1325-1136		RA: 13 25 48.6413 (201.4526721d) Dec: -11 36 37.94 (-11.61054d) Equinox: J2000				V=17.43		Reference Frame: ICRS					
Comments: Category=GALAXY Description=[STARBURST]															
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit			
	1	F125-LP (1906439)	(2) J1325-1136	ACS/SBC, ACCUM, SBC-FIX		F125LP		POS TARG 0.065,nu ll; SHADOW	Pattern 2, Exps 1-4 i n J1325 - 2 (10) (2)	300 Secs (600 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
	2	F140-LP (1906445)	(2) J1325-1136	ACS/SBC, ACCUM, SBC-FIX		F140LP		POS TARG 0.065,nu ll	Pattern 2, Exps 1-4 i n J1325 - 2 (10) (2)	410 Secs (820 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
	3	F150-LP (1906452)	(2) J1325-1136	ACS/SBC, ACCUM, SBC-FIX		F150LP		POS TARG 0.065,nu ll	Pattern 2, Exps 1-4 i n J1325 - 2 (10) (2)	750 Secs (1500 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
	4	F165-LP (1906460)	(2) J1325-1136	ACS/SBC, ACCUM, SBC-FIX		F165LP		POS TARG 0.065,nu ll	Pattern 2, Exps 1-4 i n J1325 - 2 (10) (2)	690 Secs (1380 Secs)					
										[==>(Pattern 1)]		[1]			
[==>(Pattern 2)]										[2]					



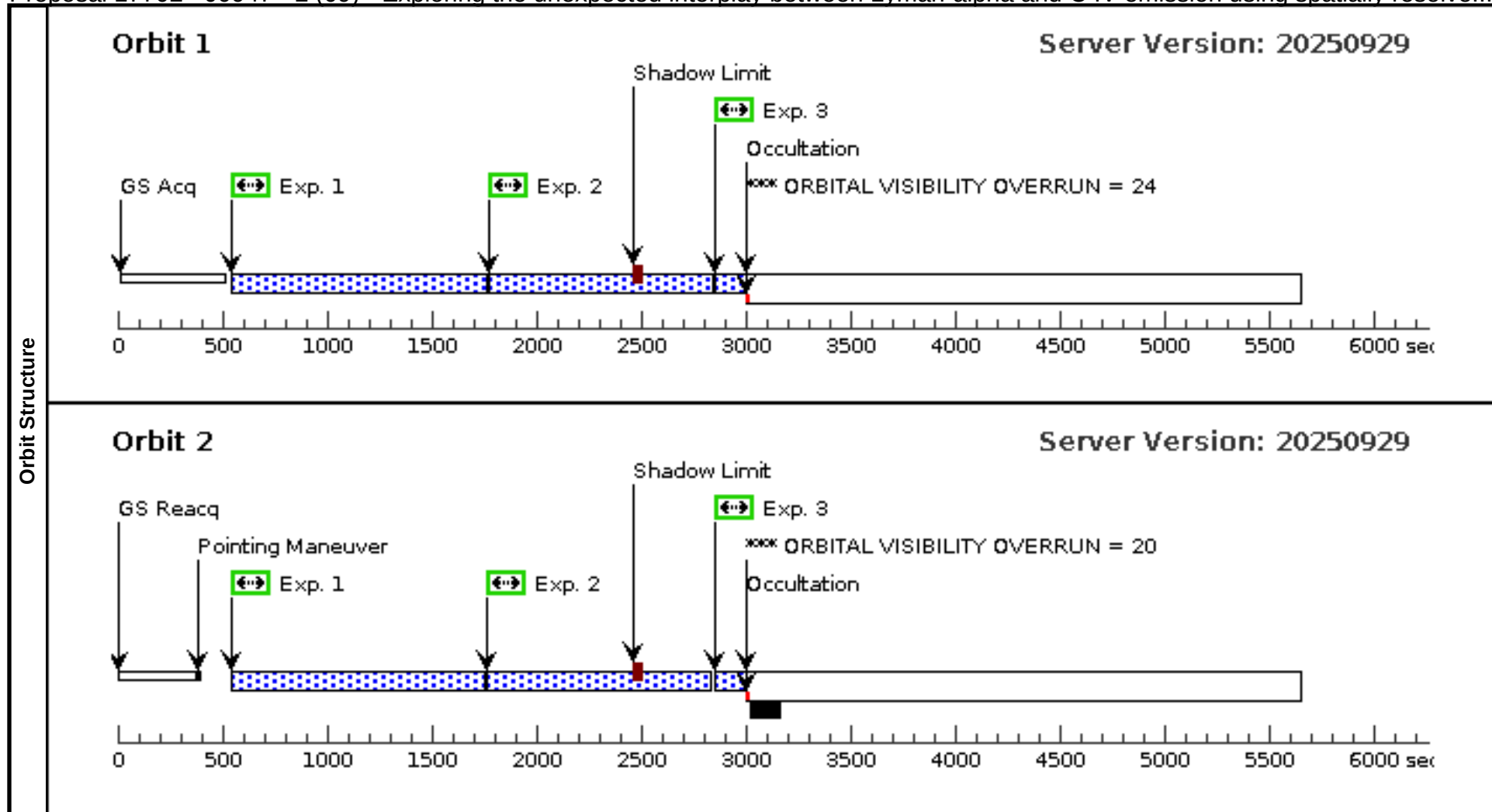
Proposal 17702 - J0947 - 1 (08) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J0947 - 1 (08), completed										Fri Feb 27 19:00:22 GMT 2026		
	Diagnostic Status: Warning												
	Scientific Instruments: ACS/SBC												
	Special Requirements: (none)												
Diagnostics	(J0947 - 1 (08)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN												
	(J0947 - 1 (08)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN												
	(J0947 - 1 (08)) Informational (Form): APT cannot model timing accurately, contact your assigned Program Coordinator.												
Patterns	#	Primary Pattern					Secondary Pattern					Exposures	
	(2)	Pattern Type=ACS-SBC-DITHER-LINE			Coordinate Frame=POS-TARG							(1-3)	
	Purpose=DITHER			Pattern Orientation=44.4									
	Number Of Points=2			Angle Between Sides=									
Point Spacing=0.472			Center Pattern=false										
Line Spacing=													
Fixed Targets	#	Name	Target Coordinates			Targ. Coord. Corrections			Fluxes		Miscellaneous		
	(3)	J0947+4138	RA: 09 47 18.2410 (146.8260042d)						V=17.57		Reference Frame: ICRS		
	Dec: +41 38 16.44 (41.63790d)												
	Equinox: J2000												
Comments: Category=GALAXY Description=[STARBURST]													
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit	
	1	F125-LP (1906435)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F125LP		SHADOW	Pattern 2, Exps 1-3 i n J0947 - 1 (08) (2)	1150 Secs (2300 Secs)			
										[==>(Pattern 1)]		[1]	
										[==>(Pattern 2)]		[2]	
	2	F140-LP (1906443)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F140LP			Pattern 2, Exps 1-3 i n J0947 - 1 (08) (2)	1025 Secs (2050 Secs)			
										[==>(Pattern 1)]		[1]	
										[==>(Pattern 2)]		[2]	
	3	F165-LP (1906458)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F165LP			Pattern 2, Exps 1-3 i n J0947 - 1 (08) (2)	100 Secs (200 Secs)			
										[==>(Pattern 1)]		[1]	
										[==>(Pattern 2)]		[2]	



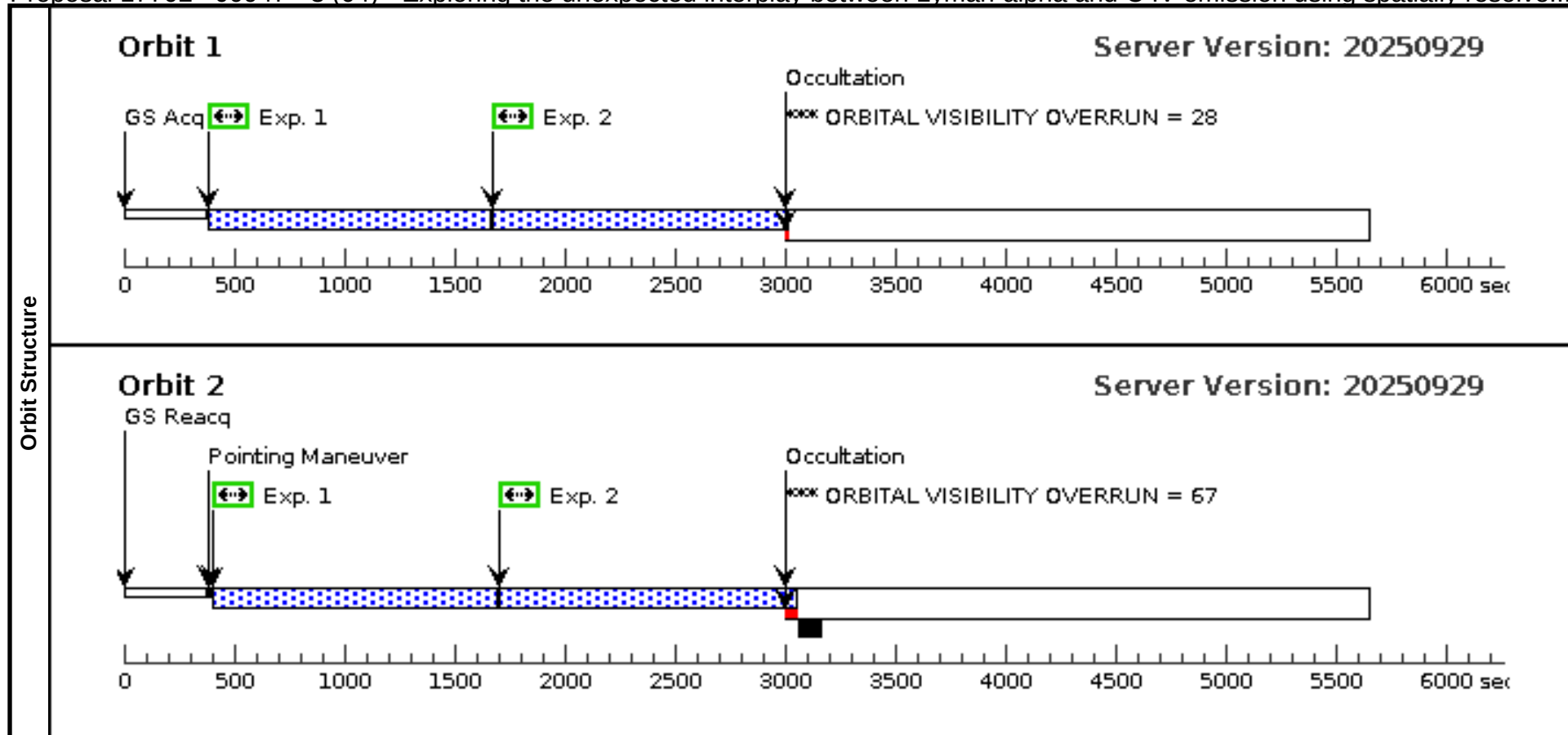
Proposal 17702 - J0947 - 2 (09) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J0947 - 2 (09), completed										Fri Feb 27 19:00:22 GMT 2026		
	Diagnostic Status: Warning												
	Scientific Instruments: ACS/SBC												
	Special Requirements: (none)												
Diagnostics	(J0947 - 2 (09)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN												
	(J0947 - 2 (09)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN												
	(J0947 - 2 (09)) Informational (Form): APT cannot model timing accurately, contact your assigned Program Coordinator.												
Patterns	#	Primary Pattern					Secondary Pattern					Exposures	
	(2)	Pattern Type=ACS-SBC-DITHER-LINE			Coordinate Frame=POS-TARG							(1-3)	
	Purpose=DITHER			Pattern Orientation=44.4									
	Number Of Points=2			Angle Between Sides=									
Point Spacing=0.472			Center Pattern=false										
Line Spacing=													
Fixed Targets	#	Name	Target Coordinates			Targ. Coord. Corrections			Fluxes		Miscellaneous		
	(3)	J0947+4138	RA: 09 47 18.2410 (146.8260042d)						V=17.57		Reference Frame: ICRS		
	Dec: +41 38 16.44 (41.63790d)												
	Equinox: J2000												
Comments: Category=GALAXY Description=[STARBURST]													
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit	
	1	F125-LP (1906435)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F125LP		POS TARG 0.065,0; SHADOW	Pattern 2, Exps 1-3 i n J0947 - 2 (09) (2)	1150 Secs (2300 Secs)			
										[==>(Pattern 1)]		[1]	
										[==>(Pattern 2)]		[2]	
	2	F140-LP (1906443)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F140LP		POS TARG 0.065,0.	Pattern 2, Exps 1-3 i n J0947 - 2 (09) (2)	1025 Secs (2050 Secs)			
										[==>(Pattern 1)]		[1]	
										[==>(Pattern 2)]		[2]	
	3	F165-LP (1906458)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F165LP		POS TARG 0.065,0.0	Pattern 2, Exps 1-3 i n J0947 - 2 (09) (2)	100 Secs (200 Secs)			
										[==>(Pattern 1)]		[1]	
										[==>(Pattern 2)]		[2]	



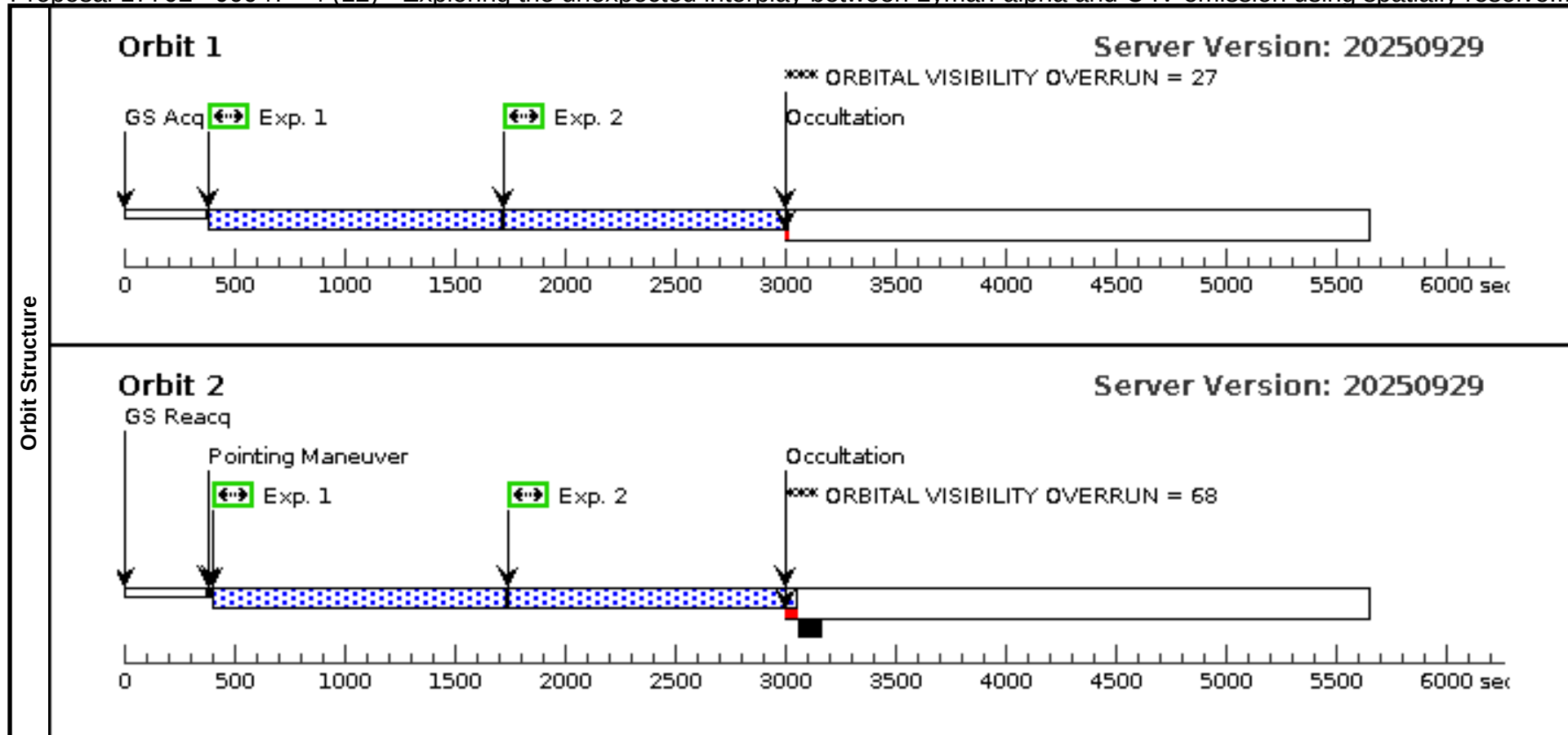
Proposal 17702 - J0947 - 3 (04) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J0947 - 3 (04), completed										Fri Feb 27 19:00:22 GMT 2026	
	Diagnostic Status: Warning											
	Scientific Instruments: ACS/SBC											
	Special Requirements: (none)											
Diagnostics	(J0947 - 3 (04)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN											
	(J0947 - 3 (04)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN											
Patterns	#	Primary Pattern				Secondary Pattern				Exposures		
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Purpose=DITHER Number Of Points=2 Point Spacing=0.472 Line Spacing=		Coordinate Frame=POS-TARG Pattern Orientation=44.4 Angle Between Sides= Center Pattern=false						(1-2)		
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous		
	(3)	J0947+4138		RA: 09 47 18.2410 (146.8260042d) Dec: +41 38 16.44 (41.63790d) Equinox: J2000				V=17.57		Reference Frame: ICRS		
	Comments: Category=GALAXY Description=[STARBURST]											
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit
	1	F165-LP (1906458)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F165LP			Pattern 2, Exps 1-2 in J0947 - 3 (04) (2)	595 Secs (2448 Secs)		
										[==>1218.0 Secs (Pattern 1)]		[1]
										[==>1230.0 Secs (Pattern 2)]		[2]
	2	F150-LP (1906449)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F125LP			Pattern 2, Exps 1-2 in J0947 - 3 (04) (2)	650 Secs (2558 Secs)		
										[==>1273.0 Secs (Pattern 1)]		[1]
[==>1285.0 Secs (Pattern 2)]										[2]		



Proposal 17702 - J0947 - 4 (12) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J0947 - 4 (12), completed										Fri Feb 27 19:00:22 GMT 2026	
	Diagnostic Status: Warning											
	Scientific Instruments: ACS/SBC											
	Special Requirements: (none)											
Diagnostics	(J0947 - 4 (12)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN											
	(J0947 - 4 (12)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN											
Patterns	#	Primary Pattern				Secondary Pattern				Exposures		
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Purpose=DITHER Number Of Points=2 Point Spacing=0.472 Line Spacing=		Coordinate Frame=POS-TARG Pattern Orientation=44.4 Angle Between Sides= Center Pattern=false						(1-2)		
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous		
	(3)	J0947+4138		RA: 09 47 18.2410 (146.8260042d) Dec: +41 38 16.44 (41.63790d) Equinox: J2000				V=17.57		Reference Frame: ICRS		
	Comments: Category=GALAXY Description=[STARBURST]											
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit
	1	F165-LP (1906458)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F165LP		POS TARG 0.065,nu ll	Pattern 2, Exps 1-2 in J0947 - 4 (12) (2)	580 Secs (2533 Secs)		
										[==>1260.0 Secs (Pattern 1)]		[1]
										[==>1273.0 Secs (Pattern 2)]		[2]
	2	F150-LP (1906449)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F125LP		POS TARG 0.065,nu ll	Pattern 2, Exps 1-2 in J0947 - 4 (12) (2)	550 Secs (2473 Secs)		
										[==>1230.0 Secs (Pattern 1)]		[1]
[==>1243.0 Secs (Pattern 2)]										[2]		

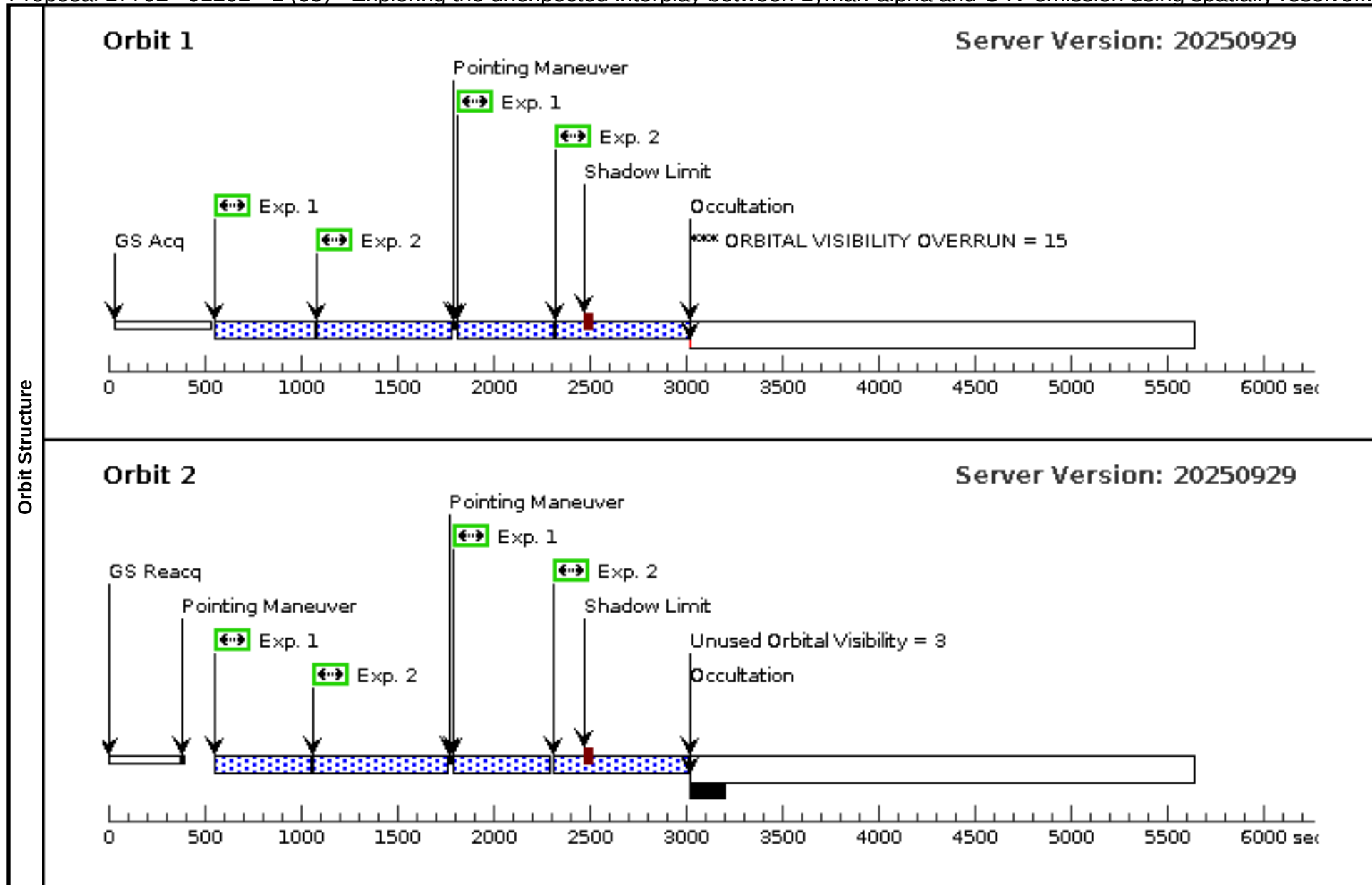


Proposal 17702 - J0947 - 5 (11) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J0947 - 5 (11), completed										Fri Feb 27 19:00:22 GMT 2026			
	Diagnostic Status: Warning													
	Scientific Instruments: ACS/SBC													
	Special Requirements: (none)													
Diagnostics	(J0947 - 5 (11)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN													
Patterns	#	Primary Pattern						Secondary Pattern				Exposures		
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Purpose=DITHER Number Of Points=2 Point Spacing=0.472 Line Spacing=						Coordinate Frame=POS-TARG Pattern Orientation=44.4 Angle Between Sides= Center Pattern=false				(1)		
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous				
	(3)	J0947+4138		RA: 09 47 18.2410 (146.8260042d) Dec: +41 38 16.44 (41.63790d) Equinox: J2000				V=17.57		Reference Frame: ICRS				
Comments: Category=GALAXY Description=[STARBURST]														
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit		
	1	F150-LP (1906449)	(3) J0947+4138	ACS/SBC, ACCUM, SBC-FIX		F125LP			Pattern 2, Exps 1-1 in J0947 - 5 (11) (2)	500 Secs (2528 Secs)		[1]		
										[==>1264.0 Secs (Pattern 1)]				
										[==>1264.0 Secs (Pattern 2)]				
Orbit Structure	Orbit 1 Server Version: 20250929 GS Acq Exp. 1 Pointing Maneuver Exp. 1 Occultation ORBITAL VISIBILITY OVERRUN = 48 0 500 1000 1500 2000 2500 3000 3500 4000 4500 5000 5500 6000 sec													

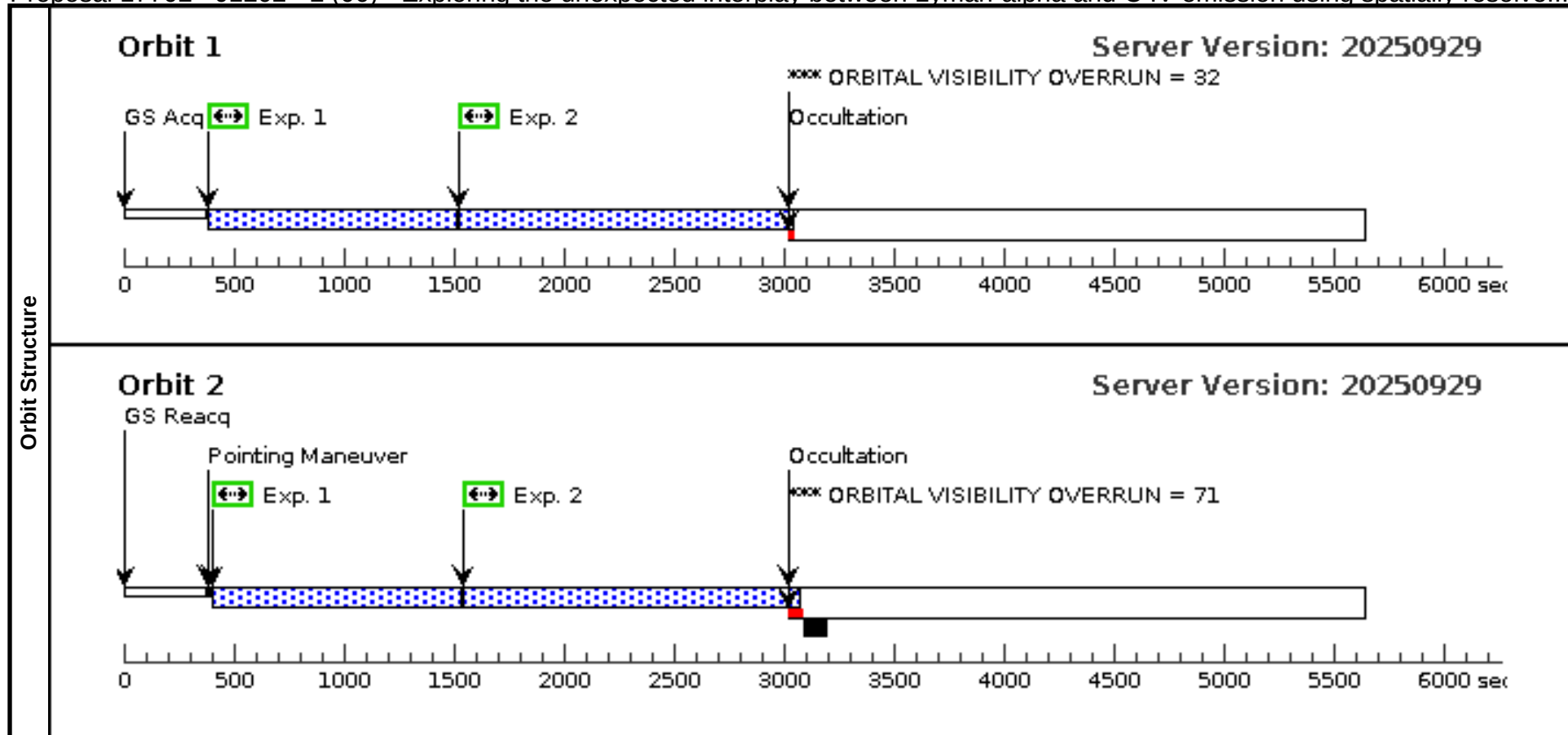
Proposal 17702 - J1202 - 1 (05) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J1202 - 1 (05), completed										Fri Feb 27 19:00:22 GMT 2026			
	Diagnostic Status: Warning													
	Scientific Instruments: ACS/SBC													
	Special Requirements: (none)													
Diagnostics	(J1202 - 1 (05)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN													
	(J1202 - 1 (05)) Informational (Form): APT cannot model timing accurately, contact your assigned Program Coordinator.													
Patterns	#	Primary Pattern					Secondary Pattern					Exposures		
	(1)	Pattern Type=ACS-SBC-DITHER-BOX Purpose=DITHER Number Of Points=4 Point Spacing=0.179 Line Spacing=0.116			Coordinate Frame=POS-TARG Pattern Orientation=20.02 Angle Between Sides=63.65 Center Pattern=false							(1-2)		
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous				
	(4)	J1202+5416		RA: 12 02 2.4925 (180.5103854d) Dec: +54 15 51.05 (54.26418d) Equinox: J2000				V=19.5		Reference Frame: ICRS				
	Comments: Category=GALAXY Description=[STARBURST]													
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit		
	1	F125-LP (1906438)	(4) J1202+5416	ACS/SBC, ACCUM, SBC-FIX		F125LP		SHADOW	Pattern 1, Exps 1-2 i n J1202 - 1 (05) (1)	450 Secs (1800 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]				
										[==>(Pattern 3)]		[2]		
										[==>(Pattern 4)]				
	2	F140-LP (1906444)	(4) J1202+5416	ACS/SBC, ACCUM, SBC-FIX		F140LP			Pattern 1, Exps 1-2 i n J1202 - 1 (05) (1)	650 Secs (2600 Secs)				
										[==>(Pattern 1)]		[1]		
									[==>(Pattern 2)]					
									[==>(Pattern 3)]		[2]			
									[==>(Pattern 4)]					



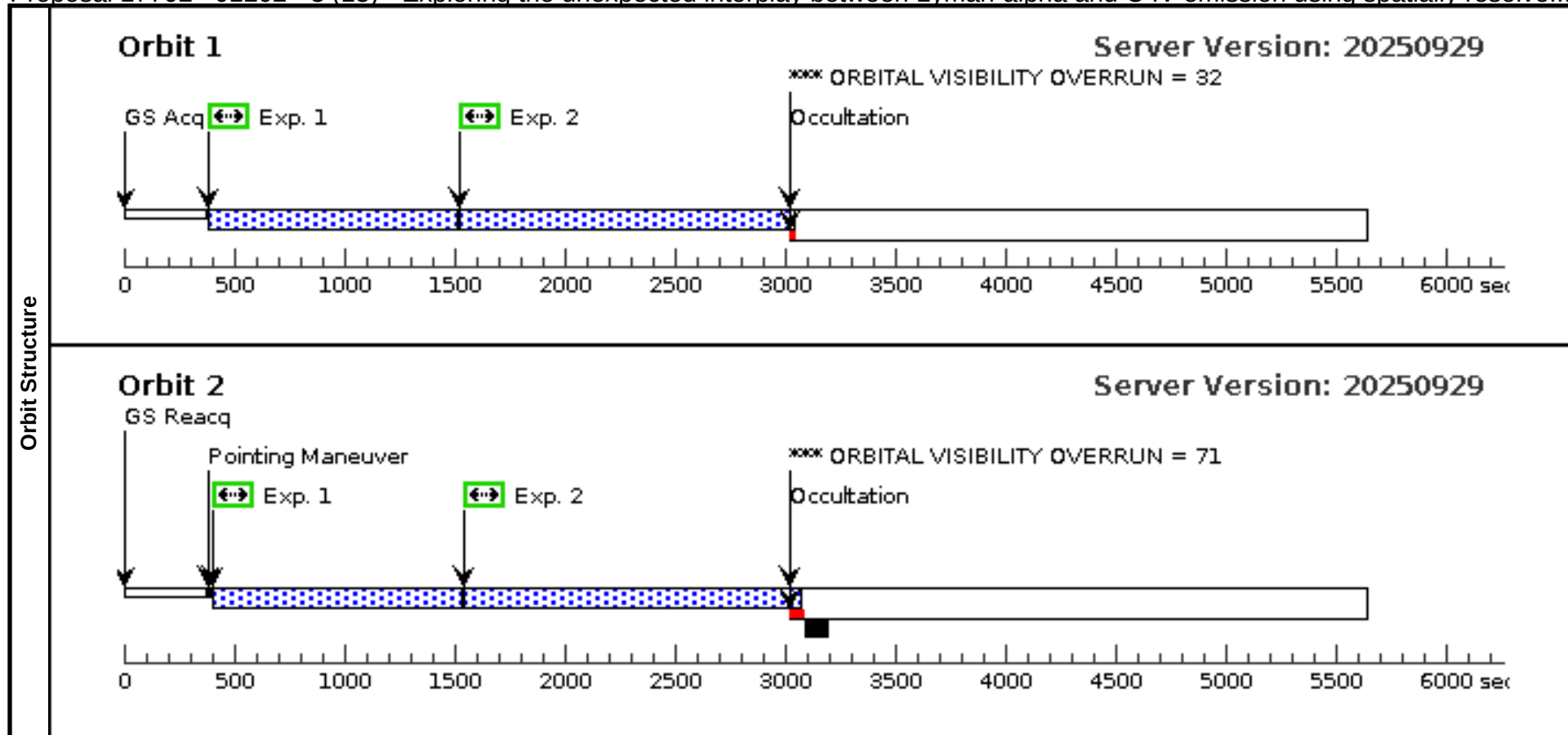
Proposal 17702 - J1202 - 2 (06) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J1202 - 2 (06), completed										Fri Feb 27 19:00:22 GMT 2026		
	Diagnostic Status: Warning												
	Scientific Instruments: ACS/SBC												
	Special Requirements: (none)												
Diagnostics	(J1202 - 2 (06)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN												
	(J1202 - 2 (06)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN												
Patterns	#	Primary Pattern					Secondary Pattern					Exposures	
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Purpose=DITHER Number Of Points=2 Point Spacing=0.472 Line Spacing=			Coordinate Frame=POS-TARG Pattern Orientation=44.4 Angle Between Sides= Center Pattern=false								(1-2)
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous			
	(4)	J1202+5416		RA: 12 02 2.4925 (180.5103854d) Dec: +54 15 51.05 (54.26418d) Equinox: J2000				V=19.5		Reference Frame: ICRS			
	Comments: Category=GALAXY Description=[STARBURST]												
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit	
	1	F165-LP (1906459)	(4) J1202+5416	ACS/SBC, ACCUM, SBC-FIX		F165LP			Pattern 2, Exps 1-2 in J1202 - 2 (06) (2)	500 Secs (2153 Secs)			
										[==>1067.0 Secs (Pattern 1)]		[1]	
										[==>1086.0 Secs (Pattern 2)]		[2]	
	2	F150-LP (1906451)	(4) J1202+5416	ACS/SBC, ACCUM, SBC-FIX		F150LP			Pattern 2, Exps 1-2 in J1202 - 2 (06) (2)	900 Secs (2953 Secs)			
										[==>1467.0 Secs (Pattern 1)]		[1]	
[==>1486.0 Secs (Pattern 2)]										[2]			



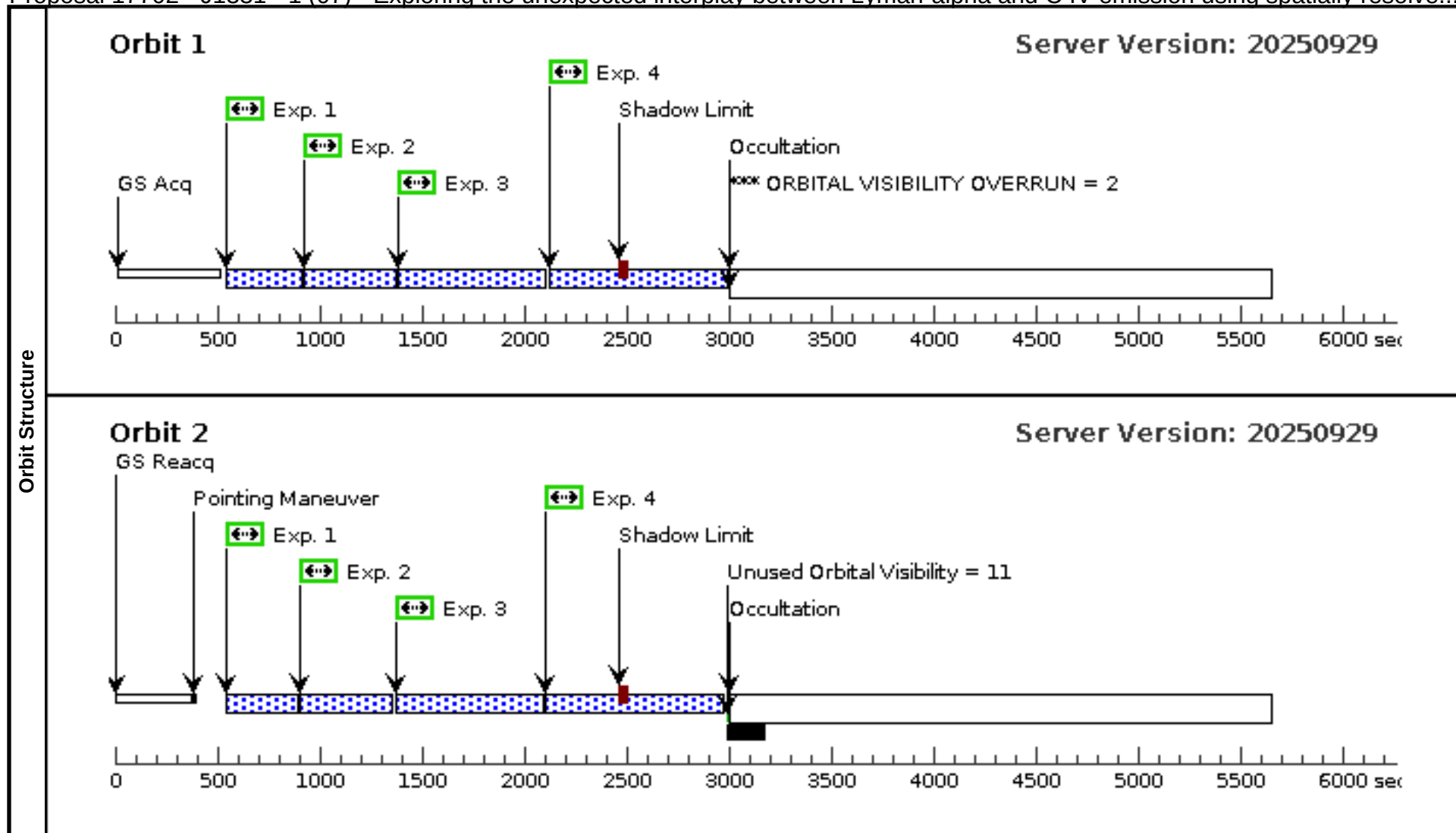
Proposal 17702 - J1202 - 3 (13) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J1202 - 3 (13), completed										Fri Feb 27 19:00:22 GMT 2026	
	Diagnostic Status: Warning											
	Scientific Instruments: ACS/SBC											
	Special Requirements: (none)											
Diagnostics	(J1202 - 3 (13)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN											
	(J1202 - 3 (13)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN											
Patterns	#	Primary Pattern				Secondary Pattern				Exposures		
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Purpose=DITHER Number Of Points=2 Point Spacing=0.472 Line Spacing=		Coordinate Frame=POS-TARG Pattern Orientation=44.4 Angle Between Sides= Center Pattern=false						(1-2)		
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous		
	(4)	J1202+5416		RA: 12 02 2.4925 (180.5103854d) Dec: +54 15 51.05 (54.26418d) Equinox: J2000				V=19.5		Reference Frame: ICRS		
	Comments: Category=GALAXY Description=[STARBURST]											
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit
	1	F165-LP (1906459)	(4) J1202+5416	ACS/SBC, ACCUM, SBC-FIX		F165LP		POS TARG 0.065,nu ll	Pattern 2, Exps 1-2 in J1202 - 3 (13) (2)	500 Secs (2153 Secs)		
										[==>1067.0 Secs (Pattern 1)]		[1]
										[==>1086.0 Secs (Pattern 2)]		[2]
	2	F150-LP (1906451)	(4) J1202+5416	ACS/SBC, ACCUM, SBC-FIX		F150LP		POS TARG 0.065,nu ll	Pattern 2, Exps 1-2 in J1202 - 3 (13) (2)	900 Secs (2953 Secs)		
										[==>1467.0 Secs (Pattern 1)]		[1]
[==>1486.0 Secs (Pattern 2)]										[2]		



Proposal 17702 - J1331 - 1 (07) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J1331 - 1 (07), completed										Fri Feb 27 19:00:22 GMT 2026				
	Diagnostic Status: Warning														
	Scientific Instruments: ACS/SBC														
	Special Requirements: (none)														
Diagnostics	(J1331 - 1 (07)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN														
	(J1331 - 1 (07)) Informational (Form): APT cannot model timing accurately, contact your assigned Program Coordinator.														
Patterns	#	Primary Pattern					Secondary Pattern					Exposures			
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Purpose=DITHER Number Of Points=2 Point Spacing=0.472 Line Spacing=			Coordinate Frame=POS-TARG Pattern Orientation=44.4 Angle Between Sides= Center Pattern=false							(1-4)			
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections		Fluxes		Miscellaneous					
	(5)	J1331+4151		RA: 13 31 26.8799 (202.8619996d) Dec: +41 51 48.24 (41.86340d) Equinox: J2000				V=17.29		Reference Frame: ICRS					
Comments: Category=GALAXY Description=[STARBURST]															
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit			
	1	F125-LP (1906440)	(5) J1331+4151	ACS/SBC, ACCUM, SBC-FIX		F125LP		SHADOW; GS ACQ SCENARI O BASE103	Pattern 2, Exps 1-4 in J1331 - 1 (07) (2)	300 Secs (600 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
	2	F140-LP (1906447)	(5) J1331+4151	ACS/SBC, ACCUM, SBC-FIX		F140LP			Pattern 2, Exps 1-4 in J1331 - 1 (07) (2)	400 Secs (800 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
	3	F165-LP (1906461)	(5) J1331+4151	ACS/SBC, ACCUM, SBC-FIX		F165LP			Pattern 2, Exps 1-4 in J1331 - 1 (07) (2)	670 Secs (1340 Secs)					
										[==>(Pattern 1)]		[1]			
										[==>(Pattern 2)]		[2]			
4	F150-LP (1906453)	(5) J1331+4151	ACS/SBC, ACCUM, SBC-FIX		F150LP			Pattern 2, Exps 1-4 in J1331 - 1 (07) (2)	820 Secs (1640 Secs)						
									[==>(Pattern 1)]		[1]				
									[==>(Pattern 2)]		[2]				



Proposal 17702 - J1331 - 2 (14) - Exploring the unexpected interplay between Lyman-alpha and C IV emission using spatially resolve...

Visit	Proposal 17702, J1331 - 2 (14), completed										Fri Feb 27 19:00:22 GMT 2026			
	Diagnostic Status: Warning													
	Scientific Instruments: ACS/SBC													
	Special Requirements: (none)													
Diagnostics	(J1331 - 2 (14)) Warning (Orbit Planner): ORBITAL VISIBILITY OVERRUN													
	(J1331 - 2 (14)) Informational (Form): APT cannot model timing accurately, contact your assigned Program Coordinator.													
Patterns	#	Primary Pattern					Secondary Pattern					Exposures		
	(2)	Pattern Type=ACS-SBC-DITHER-LINE Coordinate Frame=POS-TARG Pattern Orientation=44.4 Purpose=DITHER Angle Between Sides= Number Of Points=2 Center Pattern=false Point Spacing=0.472 Line Spacing=										(1-4)		
Fixed Targets	#	Name		Target Coordinates		Targ. Coord. Corrections			Fluxes		Miscellaneous			
	(5)	J1331+4151		RA: 13 31 26.8799 (202.8619996d) Dec: +41 51 48.24 (41.86340d) Equinox: J2000					V=17.29		Reference Frame: ICRS			
	Comments: Category=GALAXY Description=[STARBURST]													
Exposures	#	Label (ETC Run)	Target	Config,Mode,Aperture		Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]		Orbit		
	1	F125-LP (1906440)	(5) J1331+4151	ACS/SBC, ACCUM, SBC-FIX	F125LP			POS TARG 0.065,nu ll; SHADOW; GS ACQ SCENARIO BASE103	Pattern 2, Exps 1-4 in J1331 - 2 (14) (2)	300 Secs (600 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]		[2]		
	2	F140-LP (1906447)	(5) J1331+4151	ACS/SBC, ACCUM, SBC-FIX	F140LP			POS TARG 0.065,nu ll	Pattern 2, Exps 1-4 in J1331 - 2 (14) (2)	400 Secs (800 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]		[2]		
	3	F165-LP (1906461)	(5) J1331+4151	ACS/SBC, ACCUM, SBC-FIX	F165LP			POS TARG 0.065,nu ll	Pattern 2, Exps 1-4 in J1331 - 2 (14) (2)	670 Secs (1340 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]		[2]		
	4	F150-LP (1906453)	(5) J1331+4151	ACS/SBC, ACCUM, SBC-FIX	F150LP			POS TARG 0.065,nu ll	Pattern 2, Exps 1-4 in J1331 - 2 (14) (2)	820 Secs (1640 Secs)				
										[==>(Pattern 1)]		[1]		
										[==>(Pattern 2)]		[2]		

