16365 - ULLYSES LMC O9-B0 Supergiant STIS

Cycle: 28, Proposal Category: GO/DD

(Availability Mode: SUPPORTED)

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VISITS

Visit	***Targets used in Visit***	***Configurations used in Visit***	***Orbits Used***	***Last Orbit Planner Run***	***OP Current with Visit?***
1S	(1) SK-66D171 WAVE	STIS/CCD STIS/FUV-MAMA STIS/NUV-MAMA	2	28-Jan-2022 16:00:22.0	yes
2S	(2) SK-68D41 WAVE	STIS/CCD STIS/FUV-MAMA STIS/NUV-MAMA	2	28-Jan-2022 16:00:23.0	yes
3S	(3) SK-69D43 WAVE	STIS/CCD STIS/FUV-MAMA	3	28-Jan-2022 16:00:25.0	yes
CS	(3) SK-69D43 WAVE	STIS/CCD STIS/FUV-MAMA	3	28-Jan-2022 16:00:27.0	yes
4S	(3) SK-69D43 WAVE	STIS/CCD STIS/NUV-MAMA	1	28-Jan-2022 16:00:28.0	yes
DS	(3) SK-69D43 WAVE	STIS/CCD STIS/NUV-MAMA	1	28-Jan-2022 16:00:29.0	yes
5S	(4) SK-70D32 WAVE	STIS/CCD STIS/FUV-MAMA	3	28-Jan-2022 16:00:30.0	yes

Visit	*Targets used in Visit*	*Configurations used in Visit*	*Orbits Used*	*Last Orbit Planner Run*	*OP Current with Visit?*
ES	(4) SK-70D32 WAVE	STIS/CCD STIS/FUV-MAMA	3	28-Jan-2022 16:00:32.0	yes
6S	(5) SK-71D8 WAVE	STIS/CCD STIS/FUV-MAMA	3	28-Jan-2022 16:00:34.0	yes

21 Total Orbits Used

ABSTRACT

The Space Telescope Science Institute (STScI) Director has decided to devote up to 1000 orbits of Director's Discretionary time in observing Cycles 27-29 to a new Hubble Ultraviolet Legacy program focused on star formation and associated stellar physics. This new program, ULLYSES (UV Legacy Library of Young Stars as Essential Standards), will provide a UV spectroscopic reference sample of young (< 10 Myr) high- and low-mass stars. It will target over ~150 OB stars in the Magellanic Clouds and lower metallicity galaxies in the Local Group, and ~40 T Tauri stars and brown dwarfs in the Milky Way. In addition, ULLYSES will monitor 4 typical T Tauri stars over different rotational phases through at least three rotation periods, and over timescales of months to years. The resulting library will provide template spectra of massive stars at metallicities substantially below the well studied, while the low mass sample will cover a wide range of ages, accretion rates, and masses, including objects down to well below 0.5 M_sun. The legacy of this large UV dataset on the first 10 Myr of stellar evolution will be enhanced by complementary datasets obtained by the scientific community. In addition to the core goals of the program related to stellar astrophysics of low and high mass stars, this data will also enable exciting science in the fields of ISM, CGM, jets, and exoplanets. ULLYSES will be modeled after the Frontier Fields program: all data obtained will be non-proprietary. The implementation team at STScI is developing high-level science data products and a sophisticated database and website for disseminating data from the ULLYSES program and ancillary datasets for the ULLYSES target sample from space and ground-based facilities.

OBSERVING DESCRIPTION

This proposal includes a subset of the massive ULLYSES stars being observed in the Magellanic clouds.

Depending on target brightness, the main FUV spectral range will generally use either the STIS E140M setting or the combination of the COS c1291 + c1611 settings. Sufficiently bright stars without good FUSE data in the archive will also be observed with the COS c1096 setting to provide coverage at shorter wavelengths. Where time permits, stars of type O9 or later will also be observed with STIS E230M/1978, while for supergiants of spectral type B5 or later E230M/2707 may also be included. Where possible, targets of a given spectral type were selected to span both a range in extinction and in rotation rates to support a variety of stellar and ISM studies.

Signal-to-noise requirements used to determine the desired exposures times were defined as follows:
COS/G130M/c1096: 20 / nine-pixel resel at 1080 A
COS/G130M/c1291: 30 / six-pixel resel at 1150 A
COS/G160M/c1611: 30 / six-pixel resel at 1590 A
COS/G185M/c1953: 30 / three-pixel resel at 1860 A
COS/G185M/c1986: 30 / three-pixel resel at 1980 A
STIS/E140M/c1425: 20 / two-pixel resel at 1200 A
STIS/E230M/c1978: 20 / two-pixel resel at 1800 A
STIS/E230M/c2707: 20 / two-pixel resel at 2800 A
The actual implemented exposure times may be adjusted to efficiently use HST orbits, but should always provide at least 80% of the desired time as defined by the above requirements.

Additional details about the scientific motivation and technical implementation strategy of the ULLYSES observations can be found at http://www.stsci.edu/stsci-research/research-topics-and-programs/ullyses. The ULLYSES program is based on the recommendations of a working group led by Sally Oey; the full text of that group's report can be found at http://www.stsci.edu/files/live/sites/www/files/home/stsci-research/research-topics-and-programs/ullyses/_documents/HSTUV-report-ULLYSES.pdf.

Visit

Proposal 16365, SK-66D171-STIS (1S), scheduled Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/NUV-MAMA, STIS/CCD, STIS/FUV-MAMA

Special Requirements: SCHED 100%

Comments: vstatus; 1S; SK-66D171; P/STIS Approved for submission; P/DW 05/08/20 ; intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; SK-66D171 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no -- 1 unknown for GSC2 (the target), not covered by GALEX -- cleared via ETC
vcheck; S/N ETC calcs done & documented?; yes ...
acq: F28x50LP, 1 sec yields S/N~230 --
e140m: brightest pix has 0.099 cts/s, global 5181/157 cts/s (source/back) for new SED -- similar for IUE --
e230m: brightest pix has 0.177 cts/s, global 5092/2307 cts/s (source/back) for new SED -- similar for IUE --
S/N ~ 25 near 1200 A in 3200 sec (18-20 for (IUE), S/N ~ 20 near 1800 in 1200 sec (similar for IUE)
vcheck; Field images checked & saved?; yes ...
target appears single/symmetrical in both DSS and 2MASS --
faint star ~8" N is several mag fainter in IR -- nearest bright star is about 48" WNW (Sk-66 169)
vcheck; Selected ACQ strategy?; yes -- direct point source acq through F28x50LP, 1 sec
vcheck; Possible ACQ or Sci spoilers?; no
vcheck; Field BOT clear?; yes
vcheck; Visual BOT check for stars not in catalog?; yes
vcheck; Orbit packing finalized?; yes
vcheck; Buffer times optimized?; yes -- 80% of minimum ETC buffer time for new SED and IUE spectra
vcheck; Verify visit grouping correct; only one visit
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 2

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(1)	SK-66D171	RA: 05 37 2.4249 (84.2601038d)	Proper Motion RA: 0.0 sec of time/yr	V=12.19	Reference Frame: ICRS
	Alt Name1: SK-66-171	Dec: -66 38 37.02 (-66.64362d)	Proper Motion Dec: 0.0 arcsec/yr	SpT=O9 Ia; E(B-V)=0.13; U=11.02; B=12.04; V=12.19; F1160=1.77e-12	
	Alt Name2: SK-66171	Equinox: J2000			

Comments: SK-66D171 : Sk -66 171, Sk_-66171, SK -66 171
Previous name : Sk -66 171
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -66 171): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-66+171&submit=submit+id
SpT = O9 Ia
COS/G130M/c1096 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam)
Coordinate pedigree: Gaia
v sin i = 90
Calculation performed 2020-02-24T18:08:50, v0.4
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tstatus; SK-66D171; P/STIS Approved for submission; S/ins not started; P/DW 05/08/20; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-66D171 'Sk-66 171' ...
aka HD 269889
tcheck; Target info verification status?; yes -- coordinates match, spectral type consistent ...
SIMBAD UB = 11.38,10.25 (from Bonanos et al. 2009, originally from Zaritsky et al. 2004) appears to be incorrect --
Isserstedt (1975) gives UBV = 11.02,12.04,12.19 -- V confirmed by ubvy values from Fitzpatrick (1988) --
so B-V=-0.15 and E(B-V)=0.13
tcheck; Coordinates & P.M. updated?; coordinates agree with Gaia DR2, pm set to 0.0
tcheck; Adopted SED compared to Observations?; yes ...
original SED (WMB O9.5 I, 1.8e-12 at 1160, E(B-V)=0.26) was much too high, due to E(B-V) too high --
new SED (WNMB O9.5 I, 1.7e-12 at 1360, E(B-V)=0.09 fits FUSE and IUE swp 1150-1400 reasonably well, but is higher than IUE for 1400-1800 and slightly lower than IUE lwr above 1800
Category=EXT-STAR
Description=[SUPERGIANT O]
Extended=NO

Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1459581)	(1) SK-66D171	STIS/CCD, ACQ, F28X50LP	MIRROR				1.0 Secs (1 Secs) *[==>]*	***[1]***
	Comments: ETC 1459581 uses new SED, without further normalization -- normalizing to V=12.2 yields only minor differences *1 sec through F28x50LP yields S/N~230*								
2	E140M/1425 (1459690)	(1) SK-66D171	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=180.0		Sequence 2-3 Non-Int in SK-66D171-STIS (1S)	2192.0 Secs (2192 Secs) *[==>]*	***[1]***
	Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9 Ia --> O9.5 I* *SED = SK-66D171_STIS_E140M_c1425_sed.fits* *For exptime=2174.6 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 13377.5 cts/s/segment* *brightest pixel: 0.164 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:09:01, v0.4* *calculation performed with new SED -- obtain S/N~25 near 1200 A in 3200 sec* *brightest pix 0.099 cts/s (1407 A), global rates 5181/157 cts/s (source/back), buffer time 0.8x228 sec* *very similar numbers if use IUE spectrum*								
3	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 2-3 Non-Int in SK-66D171-STIS (1S)	*[==>]*	***[1]***
4	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-5 Non-Int in SK-66D171-STIS (1S)	*[==>]*	***[1]***
	Comments: added extra wavecal at end of occultation to be a bit closer to second e140m exposure								
5	E140M/1425 (1459690)	(1) SK-66D171	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=180.0		Sequence 4-5 Non-Int in SK-66D171-STIS (1S)	999.0 Secs (999 Secs) *[==>]*	***[2]***
	Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9 Ia --> O9.5 I* *SED = SK-66D171_STIS_E140M_c1425_sed.fits* *For exptime=2174.6 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 13377.5 cts/s/segment* *brightest pixel: 0.164 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:09:01, v0.4* *calculation performed with new SED -- obtain S/N~25 near 1200 A in 3200 sec* *brightest pix 0.099 cts/s (1407 A), global rates 5181/157 cts/s (source/back), buffer time 0.8x228 sec* *very similar numbers if use IUE spectrum*								

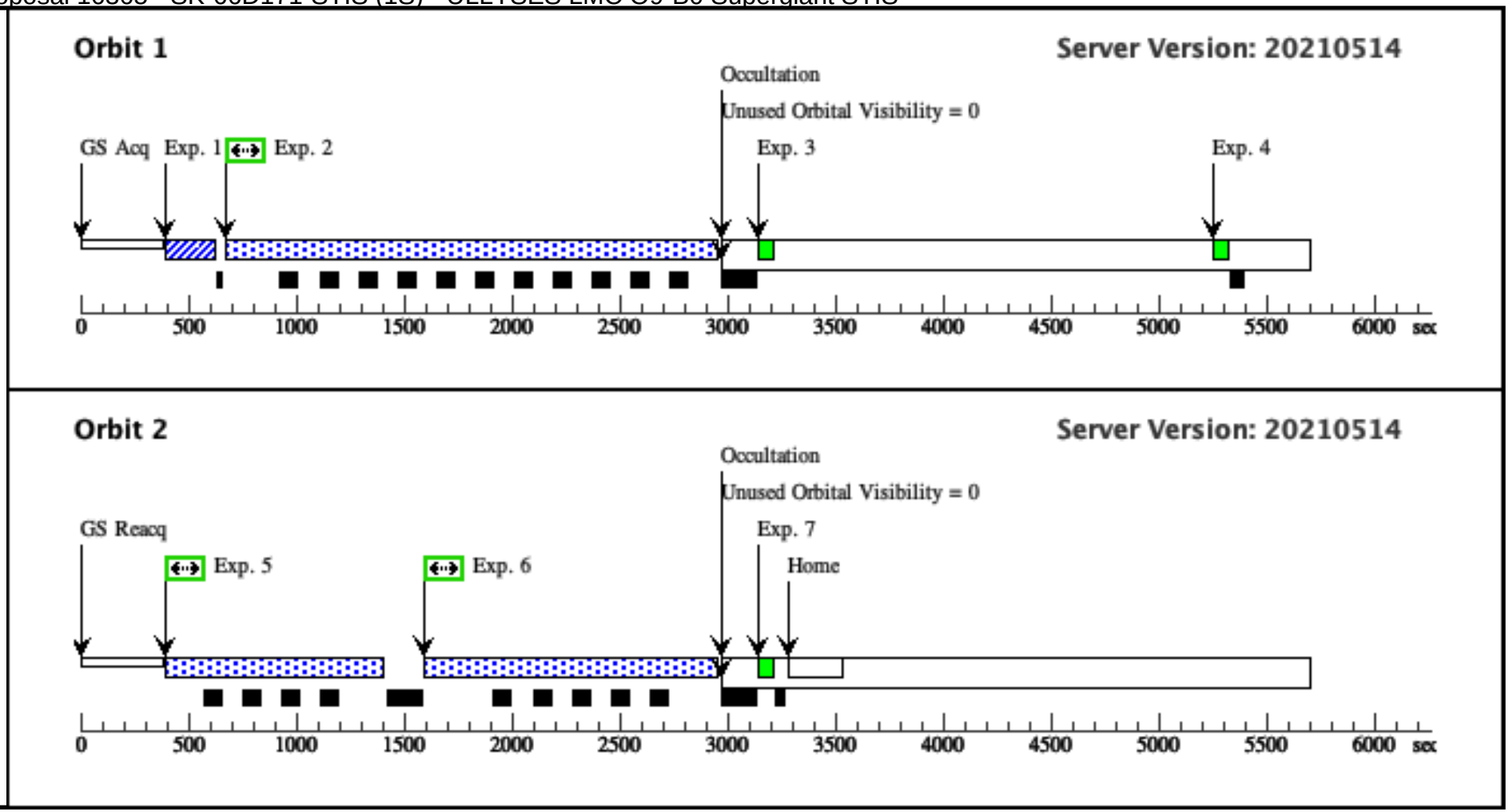
6	E230M/1978 (1459685)	(1) SK-66D171	STIS/NUV-MAMA, TIME-TAG, 0.2X0.2	E230M 1978 A	WAVECAL=NO; BUFFER-TIME=180.0	1200.0 Secs (1200 Secs) *[==>]*	**[2]**

Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.260), flux1160 +- 30.0A flux=1.8e-12 Flam); stis,nuvmama,e230m,c1978,0.2x0.2,mjd#59305
From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
Spectral type: O9 Ia --> O9.5 I
SED = SK-66D171_STIS_E230M_c1978_sed.fits
For exptime=667.5 s, spectral region:
1800.0 +- 0.5 A achieves SNR=20.0/resel
global countrate (brightest segment): 13884.8 cts/s/segment
brightest pixel: 0.321 cts/s/pix at 2319.5 A
Calculation performed 2020-02-24T18:09:01, v0.4

calculation performed with new SED -- obtain S/N~20 near 1800 A in 1200 sec
brightest pix 0.177 cts/s (2293 A), global rates 5092/2307 cts/s (source/back), buffer time 0.8x228 sec
very similar numbers if use IUE spectrum

7	E230M/1978	WAVE WAVECAL	STIS/NUV-MAMA, ACCUM, 0.2X0.2	E230M 1978 A		*[==>]*	**[2]**

Orbit Structure



Visit

Proposal 16365, SK-68D41-STIS (2S), scheduled Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/NUV-MAMA, STIS/CCD, STIS/FUV-MAMA

Special Requirements: SCHED 100%

Comments: vstatus; 2S; SK-68D41; P/STIS Approved for submission; P/DW 18/01/21 ; intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; SK-68D41 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no
vcheck; S/N ETC calcs done & documented?; yes ...
acq -- F28x50LP, 0.5 sec yields S/N~183 --
e140m -- IUE spectrum / 3200 sec -- brightest pix 0.07 cts/s (1310 A), global 3587+157 cts/s, S/N~20 near 1200 A --
e230m -- IUE spectrum / 1200 sec -- brightest pix 0.21 cts/s (2293 A), global 4584+2307 cts/s, S/N~18 near 1800 A --
IUE agrees well with FOS and FUSE -- adopted SED agrees below about 1500 A
vcheck; Field images checked & saved?; yes (DSS, 2MASS -- no HST images)
vcheck; Selected ACQ strategy?; yes -- direct point source acq, F28x50LP, 1 sec
vcheck; Possible ACQ or Sci spoilers?; no
vcheck; Field BOT clear?; yes -- GSC2 has 1 safe object (target), GALEX not covered, no HST images available
vcheck; Visual BOT check for stars not in catalog?; target is apparently single, clearance circle is within saturated core of image
vcheck; Orbit packing finalized?; yes
vcheck; Buffer times optimized?; yes -- e140m (327 x 0.8 = 262 sec) -- e230m (246 x 0.8 = 197 sec)
vcheck; Verify visit grouping correct; n/a -- only one visit
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 2

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(2)	SK-68D41	RA: 05 05 27.1192 (76.3629967d)	Proper Motion RA: 0.0 sec of time/yr	V=12.01	Reference Frame: ICRS
	Alt Name1: SK-6841	Dec: -68 10 2.64 (-68.16740d)	Proper Motion Dec: 0.0 arcsec/yr	SpT=B0.5Ia; E(B-V)=0.08; B=11.9; V=12.0; F1160=1.39e-12; F1360=1.27e-12; F1700=7.71e-13; F2200=5.38e-13	
	Alt Name2: SK-68-41	Equinox: J2000			

Comments: SK-68D41 : SK-68 41, Sk_-6841, SK -68 41
Previous name : SK-68 41
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -68 41): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-68+41&submit=submit+id
SpT = B0.5Ia
COS/G130M/c1096 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux1160 +- 30.0A flux=1.4e-12 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux1360 +- 30.0A flux=1.3e-12 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux1700 +- 5.0A flux=7.7e-13 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux1700 +- 5.0A flux=7.7e-13 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux1700 +- 5.0A flux=7.7e-13 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux2200 +- 5.0A flux=5.4e-13 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux1360 +- 30.0A flux=1.3e-12 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux2200 +- 5.0A flux=5.4e-13 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux2200 +- 5.0A flux=5.4e-13 Flam)
Coordinate pedigree: Gaia
v sin i = 77
Calculation performed 2020-02-24T17:49:49, v0.4
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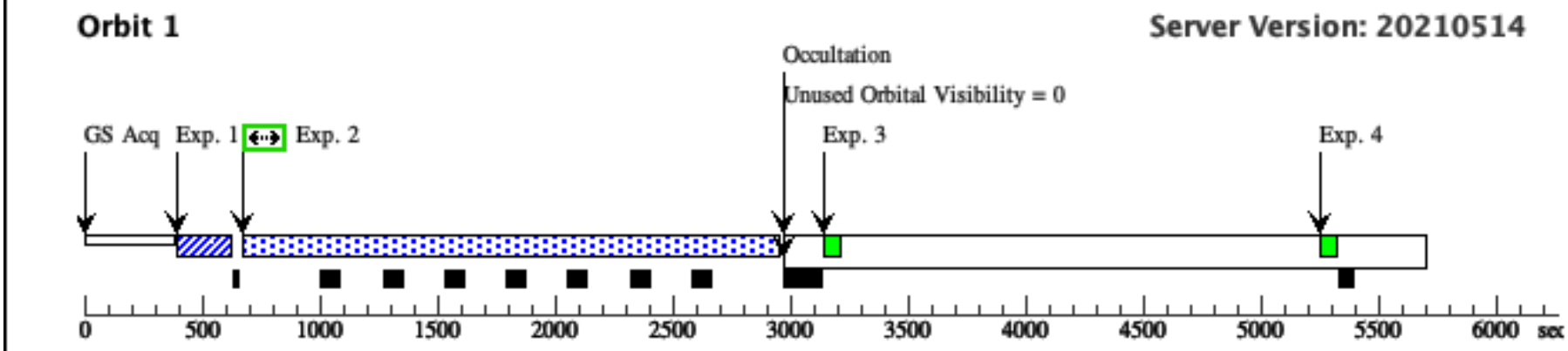
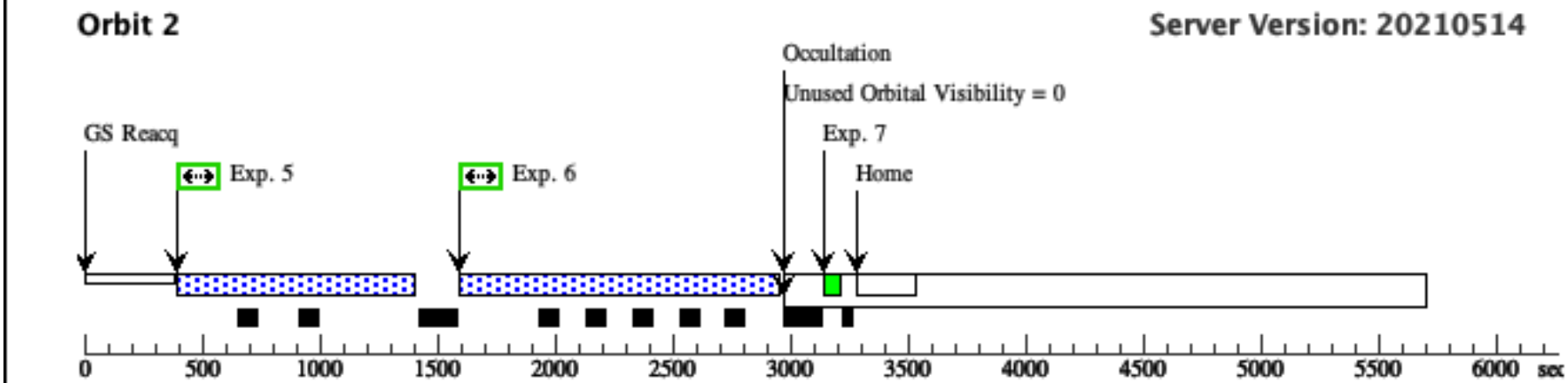
tstatus; SK-68D41; P/STIS Approved for submission; S/ins not started; P/DW 18/01/21; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-68D41 'Sk-68 41'
tcheck; Target info verification status?; coordinates ok, spectral type and magnitudes ok ...
Isserstedt gives UBV = 10.90,11.87,12.01 -- so E(B-V)~0.08 for B0.5 Ia
tcheck; Coordinates & P.M. updated?; yes, PM set to zero
tcheck; Adopted SED compared to Observations?; yes ...
FUSE, IUE (swp, lwp), FOS (G130H, G190H) all have flux ~1.4-1.5e-12 at 1180 A
adopted SED fits the observed FUSE/IUE/FOS spectra for wavelengths below about 1500 A, is higher from 1550-2000 A, and is lower by about 20-25% beyond about 2100 A (including UBV)
Category=EXT-STAR
Description=[B0-B2 III-I]
Extended=NO

Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1474291)	(2) SK-68D41	STIS/CCD, ACQ, F28X50LP	MIRROR				0.5 Secs (0.5 Secs) *[==>]*	***[1]***
2	E140M/1425 (1474292)	(2) SK-68D41	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=262.0		Sequence 2-3 Non-Int in SK-68D41-STIS (2S)	2194 Secs (2194 Secs) *[==>]*	***[1]***
								Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux1360 +- 30.0A flux=1.3e-12 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: B0.5Ia --> B0.5 I* *SED = SK-68D41_STIS_E140M_c1425_sed.fits* *For exptime=4107.3 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 6696.4 cts/s/segment* *brightest pixel: 0.078 cts/s/pix at 1333.9 A* *Calculation performed 2020-02-24T17:50:01, v0.4*		
3	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 2-3 Non-Int in SK-68D41-STIS (2S)	*[==>]*	***[1]***
4	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-5 Non-Int in SK-68D41-STIS (2S)	*[==>]*	***[1]***
5	E140M/1425 (1474292)	(2) SK-68D41	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	BUFFER-TIME=262.0		Sequence 4-5 Non-Int in SK-68D41-STIS (2S)	999 Secs (999 Secs) *[==>]*	***[2]***
6	E230M/1978 (1474293)	(2) SK-68D41	STIS/NUV-MAMA, TIME-TAG, 0.2X0.2	E230M 1978 A	WAVECAL=NO; BUFFER-TIME=197.0			1200 Secs (1200 Secs) *[==>]*	***[2]***
								Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.080), flux2200 +- 5.0A flux=5.4e-13 Flam); stis,nuvmama,e230m,c1978,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: B0.5Ia --> B0.5 I* *SED = SK-68D41_STIS_E230M_c1978_sed.fits* *For exptime=1319.4 s, spectral region:* *1800.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 9266.6 cts/s/segment* *brightest pixel: 0.191 cts/s/pix at 2293.0 A* *Calculation performed 2020-02-24T17:50:02, v0.4*		
7	E230M/1978 WAVECAL	WAVE	STIS/NUV-MAMA, ACCUM, 0.2X0.2	E230M 1978 A				*[==>]*	***[2]***

Orbit Structure





Visit

Proposal 16365, SK-69D43-STIS-E140M (3S), failed Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/CCD, STIS/FUV-MAMA

Special Requirements: SCHED 100%; GROUP 3S,4S WITHIN 30D

Comments: vstatus; 3S; SK-69D43; P/STIS Approved for submission; P/DW 20/01/21 ; intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; SK-69D43 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no
vcheck; S/N ETC calcs done & documented?; yes ...
acq -- F28x50LP / 0.5 sec gives S/N~189 --
e140m -- IUE spectrum / 7300 sec gives S/N~19 at 1200 A -- brightest 0.052 cts/s -- global 2460+157 cts/s --
e230m -- IUE spectrum / 2200 sec gives S/N>~18 at 1800 A -- brightest 0.184 cts/s -- global 3368+2307 cts/s
vcheck; Field images checked & saved?; yes -- though no HST images are available
vcheck; Selected ACQ strategy?; yes -- point source, F28x50LP
vcheck; Possible ACQ or Sci spoilers?; no -- target appears to be single, clearance region is largely within the saturated core of the target (DSS, 2MASS)
vcheck; Field BOT clear?; yes -- GSC2 indicates 1 safe (target), GALEX not covered
vcheck; Visual BOT check for stars not in catalog?; yes
vcheck; Orbit packing finalized?; yes -- 3 for e140m, 1 for e230m
vcheck; Buffer times optimized?; yes -- e140m: 472x0.8=378 sec -- e230m: 304x0.8=243 sec
vcheck; Verify visit grouping correct; within 30 days of 4S
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 4 (3 at e140m +1 at e230m)

Fixed Targets

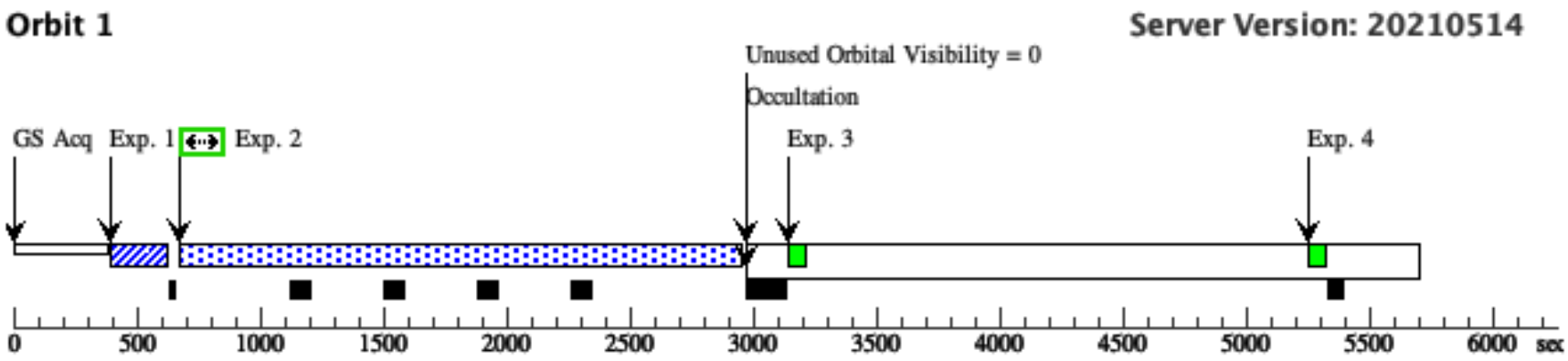
#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(3)	SK-69D43	RA: 04 56 10.4639 (74.0435996d)	Proper Motion RA: 0 sec of time/yr	V=11.96	Reference Frame: ICRS
	Alt Name1: SK-6943	Dec: -69 15 38.30 (-69.26064d)	Proper Motion Dec: 0 arcsec/yr	SpT=B0.5Ia; E(B-V)=0.13; U=10.8; B=11.9; V=12.0; F1160=8.64e-13; F1360=7.46e-13; F1700=5.80e-13; F2200=3.80e-13	
	Alt Name2: SK-69-43	Equinox: J2000			

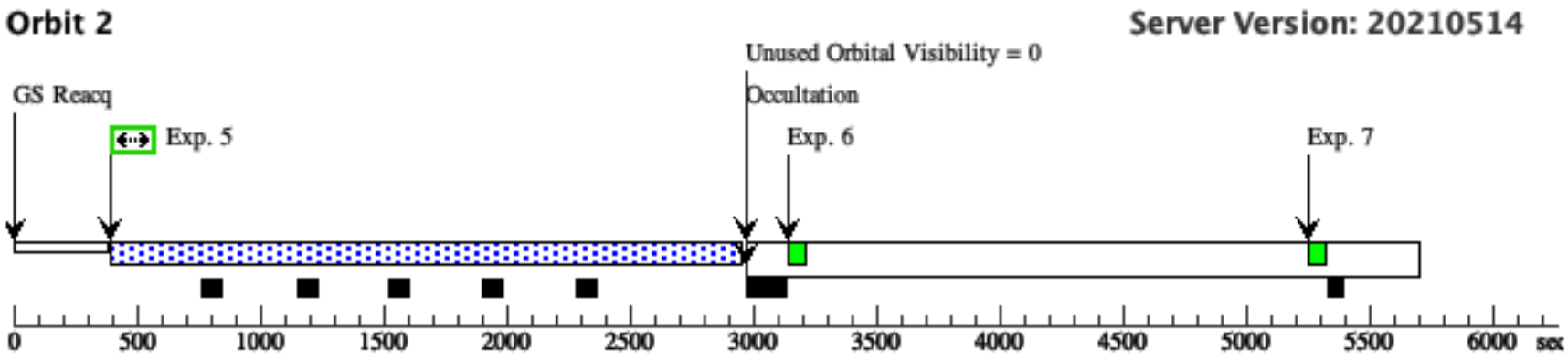
Comments: SK-69D43 : HD268809, HD_268809, SK-6943, SK -69 43
Previous name : HD268809
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -69 43): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-69+43&submit=submit+id
SpT = B0.5Ia
COS/G130M/c1096 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1160 +- 30.0A flux=8.6e-13 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
Coordinate pedigree: Gaia
v sin i = 102
Calculation performed 2020-02-24T17:49:35, v0.4
---
tstatus; SK-69D43; P/STIS Approved for submission; S/ins not started; P/DW 20/01/21; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-69D43 'Sk-69 43' ...
aka HD268809
tcheck; Target info verification status?; coordinates ok ...
spectral type and photometry ok -- B1 Ia, UBV = 10.96,11.88,11.96 -- E(B-V)=0.11
tcheck; Coordinates & P.M. updated?; yes, PM set to zero
tcheck; Adopted SED compared to Observations?; yes ...
original SED was a bit too low below 1500 A (compared to FUSE, IUE -- though in better agreement with FOS), and about 50% lower than IUE above 2100 A (and for UBV) --
new SED uses F(1360)=9e-13 and E(B-V)=0.12 -- it is between IUE and FOS below 1500 A, higher from 1600-1750 A, and lower (by ~40%) above 2100 A (including UBV)
Category=EXT-STAR
Description=[B0-B2 III-I]
Extended=NO

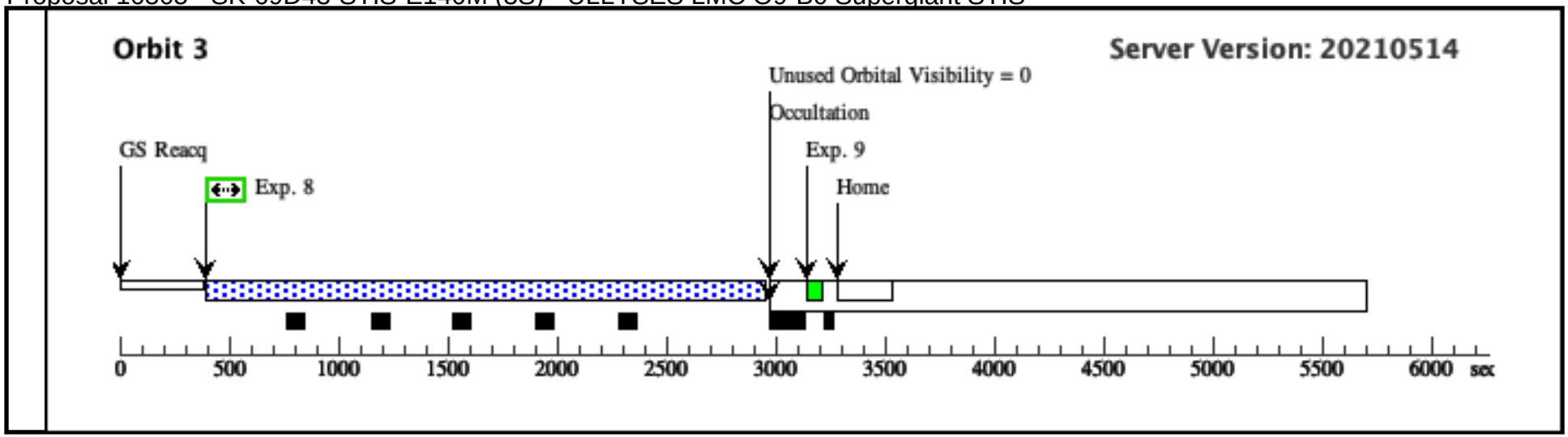
Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1474384)	(3) SK-69D43	STIS/CCD, ACQ, F28X50LP	MIRROR				0.5 Secs (0.5 Secs) *[==>]*	***[1]***
2	E140M/1425 (1474390)	(3) SK-69D43	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=378.0		Sequence 2-3 Non-Int in SK-69D43-STIS-E140M (3S)	2194 Secs (2194 Secs) *[==>]*	***[1]***
	Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv Spectral type: B0.5Ia --> B0.5 I SED = SK-69D43_STIS_E140M_c1425_sed.fits For exptime=7820.1 s, spectral region: 1200.0 +- 0.5 A achieves SNR=20.0/resel global countrate (brightest segment): 4008.3 cts/s/segment brightest pixel: 0.046 cts/s/pix at 1395.5 A Calculation performed 2020-02-24T17:49:48, v0.4									
3	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 2-3 Non-Int in SK-69D43-STIS-E140M (3S)	*[==>]*	***[1]***
4	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-69D43-STIS-E140M (3S)	*[==>]*	***[1]***
5	E140M/1425 (1474390)	(3) SK-69D43	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=378.0		Sequence 4-6 Non-Int in SK-69D43-STIS-E140M (3S)	2548 Secs (2548 Secs) *[==>]*	***[2]***
	Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv Spectral type: B0.5Ia --> B0.5 I SED = SK-69D43_STIS_E140M_c1425_sed.fits For exptime=7820.1 s, spectral region: 1200.0 +- 0.5 A achieves SNR=20.0/resel global countrate (brightest segment): 4008.3 cts/s/segment brightest pixel: 0.046 cts/s/pix at 1395.5 A Calculation performed 2020-02-24T17:49:48, v0.4									
6	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-69D43-STIS-E140M (3S)	*[==>]*	***[2]***
7	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-69D43-STIS-E140M (3S)	*[==>]*	***[2]***
8	E140M/1425 (1474390)	(3) SK-69D43	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=378.0		Sequence 7-9 Non-Int in SK-69D43-STIS-E140M (3S)	2548 Secs (2548 Secs) *[==>]*	***[3]***
	Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv Spectral type: B0.5Ia --> B0.5 I SED = SK-69D43_STIS_E140M_c1425_sed.fits For exptime=7820.1 s, spectral region: 1200.0 +- 0.5 A achieves SNR=20.0/resel global countrate (brightest segment): 4008.3 cts/s/segment brightest pixel: 0.046 cts/s/pix at 1395.5 A Calculation performed 2020-02-24T17:49:48, v0.4									
9	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-69D43-STIS-E140M (3S)	*[==>]*	***[3]***

Orbit Structure



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Occultation
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Exp. 8
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2000
2500
3000
3500
4000
4500
5000
5500
6000
sec

Visit

Proposal 16365, SK-69D43-STIS-E140M (CS), scheduling Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/CCD, STIS/FUV-MAMA

Special Requirements: SCHED 100%; GROUP CS,DS WITHIN 30D

Comments: vstatus; 3S; SK-69D43; P/STIS Approved for submission; P/DW 20/01/21 ; intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; SK-69D43 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no
vcheck; S/N ETC calcs done & documented?; yes ...
acq -- F28x50LP / 0.5 sec gives S/N~189 --
e140m -- IUE spectrum / 7300 sec gives S/N~19 at 1200 A -- brightest 0.052 cts/s -- global 2460+157 cts/s --
e230m -- IUE spectrum / 2200 sec gives S/N>~18 at 1800 A -- brightest 0.184 cts/s -- global 3368+2307 cts/s
vcheck; Field images checked & saved?; yes -- though no HST images are available
vcheck; Selected ACQ strategy?; yes -- point source, F28x50LP
vcheck; Possible ACQ or Sci spoilers?; no -- target appears to be single, clearance region is largely within the saturated core of the target (DSS, 2MASS)
vcheck; Field BOT clear?; yes -- GSC2 indicates 1 safe (target), GALEX not covered
vcheck; Visual BOT check for stars not in catalog?; yes
vcheck; Orbit packing finalized?; yes -- 3 for e140m, 1 for e230m
vcheck; Buffer times optimized?; yes -- e140m: 472x0.8=378 sec -- e230m: 304x0.8=243 sec
vcheck; Verify visit grouping correct; within 30 days of 4S
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 4 (3 at e140m +1 at e230m)

Fixed Targets

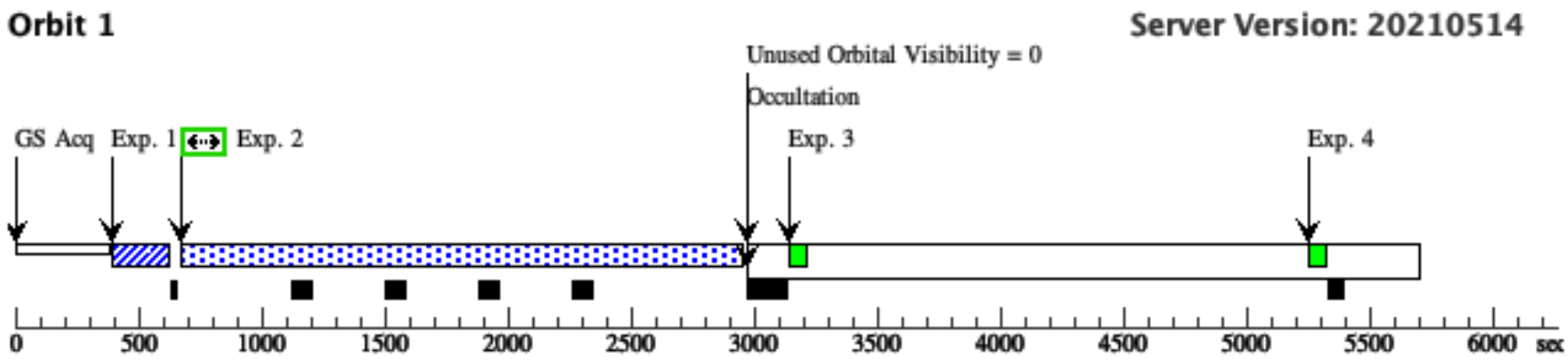
#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(3)	SK-69D43	RA: 04 56 10.4639 (74.0435996d)	Proper Motion RA: 0 sec of time/yr	V=11.96	Reference Frame: ICRS
	Alt Name1: SK-6943	Dec: -69 15 38.30 (-69.26064d)	Proper Motion Dec: 0 arcsec/yr	SpT=B0.5Ia; E(B-V)=0.13; U=10.8; B=11.9; V=12.0; F1160=8.64e-13; F1360=7.46e-13; F1700=5.80e-13; F2200=3.80e-13	
	Alt Name2: SK-69-43	Equinox: J2000			

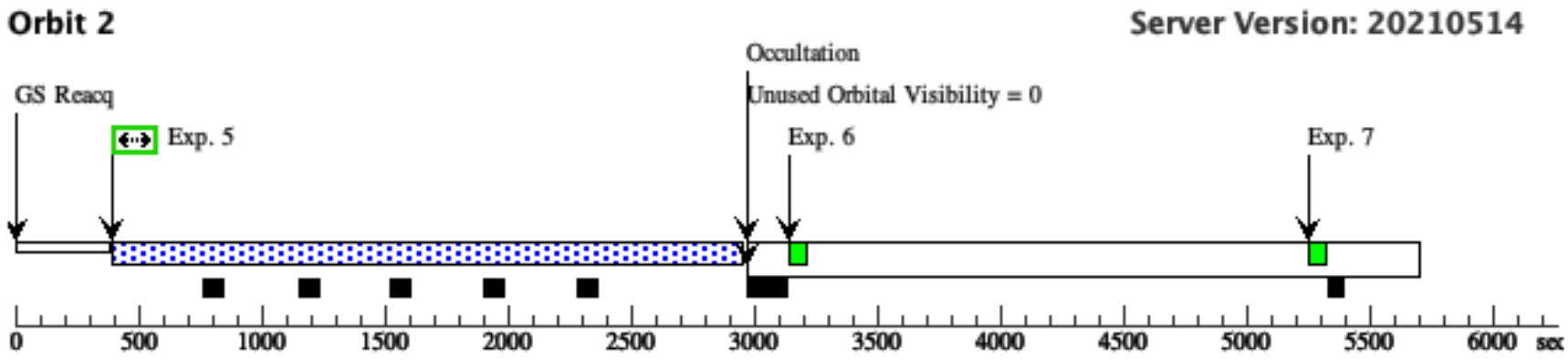
Comments: SK-69D43 : HD268809, HD_268809, SK-6943, SK -69 43
Previous name : HD268809
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -69 43): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-69+43&submit=submit+id
SpT = B0.5Ia
COS/G130M/c1096 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1160 +- 30.0A flux=8.6e-13 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
Coordinate pedigree: Gaia
v sin i = 102
Calculation performed 2020-02-24T17:49:35, v0.4
---
tstatus; SK-69D43; P/STIS Approved for submission; S/ins not started; P/DW 20/01/21; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-69D43 'Sk-69 43' ...
aka HD268809
tcheck; Target info verification status?; coordinates ok ...
spectral type and photometry ok -- B1 Ia, UBV = 10.96,11.88,11.96 -- E(B-V)=0.11
tcheck; Coordinates & P.M. updated?; yes, PM set to zero
tcheck; Adopted SED compared to Observations?; yes ...
original SED was a bit too low below 1500 A (compared to FUSE, IUE -- though in better agreement with FOS), and about 50% lower than IUE above 2100 A (and for UBV) --
new SED uses F(1360)=9e-13 and E(B-V)=0.12 -- it is between IUE and FOS below 1500 A, higher from 1600-1750 A, and lower (by ~40%) above 2100 A (including UBV)
Category=EXT-STAR
Description=[B0-B2 III-I]
Extended=NO

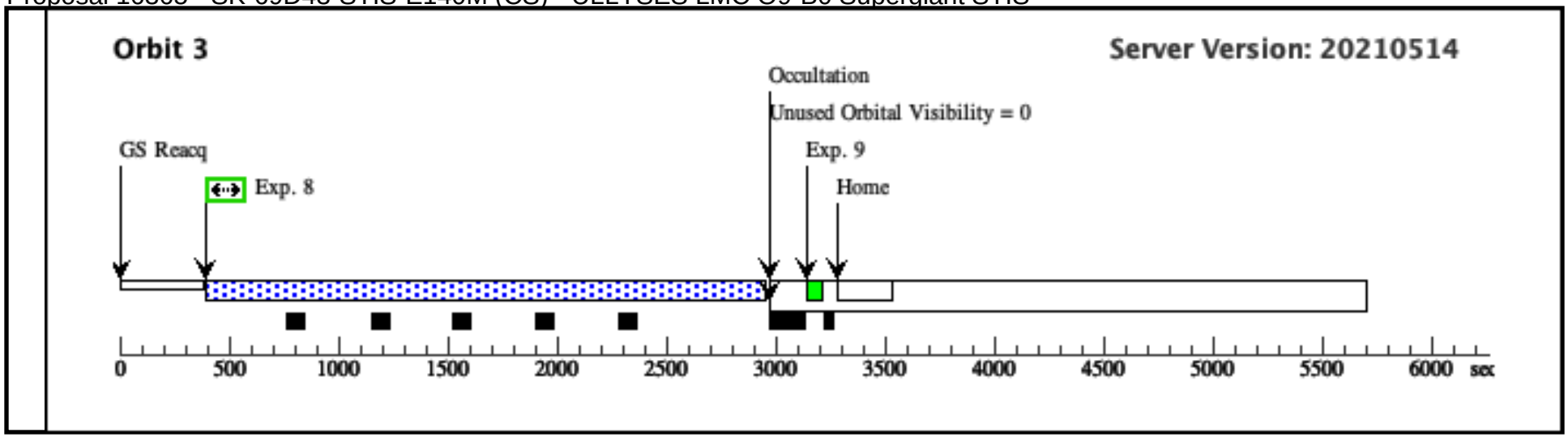
Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1474384)	(3) SK-69D43	STIS/CCD, ACQ, F28X50LP	MIRROR				0.5 Secs (0.5 Secs) *[==>]*	*[1]*
2	E140M/1425 (1474390)	(3) SK-69D43	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=378.0		Sequence 2-3 Non-Int in SK-69D43-STIS-E140M (CS)	2194 Secs (2194 Secs) *[==>]*	*[1]*
	Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: B0.5Ia --> B0.5 I* *SED = SK-69D43_STIS_E140M_c1425_sed.fits* *For exptime=7820.1 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 4008.3 cts/s/segment* *brightest pixel: 0.046 cts/s/pix at 1395.5 A* *Calculation performed 2020-02-24T17:49:48, v0.4*								
3	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 2-3 Non-Int in SK-69D43-STIS-E140M (CS)	*[==>]*	*[1]*
4	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-69D43-STIS-E140M (CS)	*[==>]*	*[1]*
5	E140M/1425 (1474390)	(3) SK-69D43	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=378.0		Sequence 4-6 Non-Int in SK-69D43-STIS-E140M (CS)	2548 Secs (2548 Secs) *[==>]*	*[2]*
	Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: B0.5Ia --> B0.5 I* *SED = SK-69D43_STIS_E140M_c1425_sed.fits* *For exptime=7820.1 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 4008.3 cts/s/segment* *brightest pixel: 0.046 cts/s/pix at 1395.5 A* *Calculation performed 2020-02-24T17:49:48, v0.4*								
6	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-69D43-STIS-E140M (CS)	*[==>]*	*[2]*
7	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-69D43-STIS-E140M (CS)	*[==>]*	*[2]*
8	E140M/1425 (1474390)	(3) SK-69D43	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=378.0		Sequence 7-9 Non-Int in SK-69D43-STIS-E140M (CS)	2548 Secs (2548 Secs) *[==>]*	*[3]*
	Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: B0.5Ia --> B0.5 I* *SED = SK-69D43_STIS_E140M_c1425_sed.fits* *For exptime=7820.1 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 4008.3 cts/s/segment* *brightest pixel: 0.046 cts/s/pix at 1395.5 A* *Calculation performed 2020-02-24T17:49:48, v0.4*								
9	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-69D43-STIS-E140M (CS)	*[==>]*	*[3]*

Orbit Structure






Orbit 3
Server Version: 20210514
Occultation
Unused Orbital Visibility = 0
GS Reacq
Exp. 8
Exp. 9
Home
0
500
1000
1500
2000
2500
3000
3500
4000
4500
5000
5500
6000
sec

Visit

Proposal 16365, SK-69D43-STIS-E230M (4S), failed Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/NUV-MAMA, STIS/CCD

Special Requirements: SCHED 100%; GROUP 4S,3S WITHIN 30D

Comments: vstatus; 4S; SK-69D43; P/STIS Approved for submission; P/DW 20/01/21 ; intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; SK-69D43 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no
vcheck; S/N ETC calcs done & documented?; yes ...
acq -- F28x50LP / 0.5 sec gives S/N~189 --
e140m -- IUE spectrum / 7300 sec gives S/N~19 at 1200 A -- brightest 0.052 cts/s -- global 2460+157 cts/s --
e230m -- IUE spectrum / 2200 sec gives S/N>~18 at 1800 A -- brightest 0.184 cts/s -- global 3368+2307 cts/s
vcheck; Field images checked & saved?; yes -- though no HST images are available
vcheck; Selected ACQ strategy?; yes -- point source, F28x50LP
vcheck; Possible ACQ or Sci spoilers?; no -- target appears to be single, clearance region is largely within the saturated core of the target (DSS, 2MASS)
vcheck; Field BOT clear?; yes -- GSC2 indicates 1 safe (target), GALEX not covered
vcheck; Visual BOT check for stars not in catalog?; yes
vcheck; Orbit packing finalized?; yes -- 3 for e140m, 1 for e230m
vcheck; Buffer times optimized?; yes -- e140m: 472x0.8=378 sec -- e230m: 304x0.8=243 sec
vcheck; Verify visit grouping correct; within 30 days of 3S
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 4 (3 at e140m +1 at e230m)

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(3)	SK-69D43	RA: 04 56 10.4639 (74.0435996d)	Proper Motion RA: 0 sec of time/yr	V=11.96	Reference Frame: ICRS
	Alt Name1: SK-6943	Dec: -69 15 38.30 (-69.26064d)	Proper Motion Dec: 0 arcsec/yr	SpT=B0.5Ia; E(B-V)=0.13; U=10.8; B=11.9; V=12.0; F1160=8.64e-13; F1360=7.46e-13; F1700=5.80e-13; F2200=3.80e-13	
	Alt Name2: SK-69-43	Equinox: J2000			

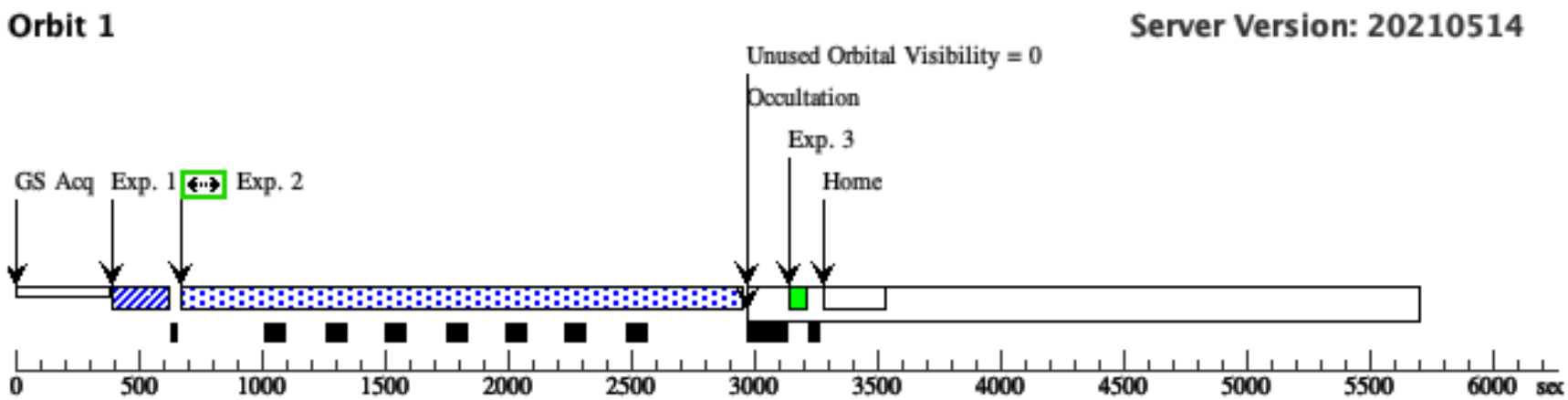
Comments: SK-69D43 : HD268809, HD_268809, SK-6943, SK -69 43
Previous name : HD268809
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -69 43): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-69+43&submit=submit+id
SpT = B0.5Ia
COS/G130M/c1096 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1160 +- 30.0A flux=8.6e-13 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
Coordinate pedigree: Gaia
v sin i = 102
Calculation performed 2020-02-24T17:49:35, v0.4
---
tstatus; SK-69D43; P/STIS Approved for submission; S/ins not started; P/DW 20/01/21; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-69D43 'Sk-69 43' ...
aka HD268809
tcheck; Target info verification status?; coordinates ok ...
spectral type and photometry ok -- B1 Ia, UBV = 10.96,11.88,11.96 -- E(B-V)=0.11
tcheck; Coordinates & P.M. updated?; yes, PM set to zero
tcheck; Adopted SED compared to Observations?; yes ...
original SED was a bit too low below 1500 A (compared to FUSE, IUE -- though in better agreement with FOS), and about 50% lower than IUE above 2100 A (and for UBV) --
new SED uses F(1360)=9e-13 and E(B-V)=0.12 -- it is between IUE and FOS below 1500 A, higher from 1600-1750 A, and lower (by ~40%) above 2100 A (including UBV)
Category=EXT-STAR
Description=[B0-B2 III-I]
Extended=NO

Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1474384)	(3) SK-69D43	STIS/CCD, ACQ, F28X50LP	MIRROR				0.5 Secs (0.5 Secs)	
								[==>]	***[1]***
2	E230M/1978 (1474392)	(3) SK-69D43	STIS/NUV-MAMA, TIME-TAG, 0.2X0.2	E230M 1978 A	WAVECAL=NO; BUFFER-TIME=243.0			2164 Secs (2164 Secs)	
								[==>]	***[1]***
3	E230M/1978 WAVECAL	WAVE	STIS/NUV-MAMA, ACCUM, 0.2X0.2	E230M 1978 A				*[==>]*	***[1]***

Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam); stis,nuvmama,e230m,c1978,0.2x0.2,mjd#59305
From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
Spectral type: B0.5Ia --> B0.5 I
SED = SK-69D43_STIS_E230M_c1978_sed.fits
For exptime=1799.1 s, spectral region:
1800.0 +- 0.5 A achieves SNR=20.0/resel
global countrate (brightest segment): 7395.1 cts/s/segment
brightest pixel: 0.141 cts/s/pix at 2319.0 A
Calculation performed 2020-02-24T17:49:48, v0.4

Orbit Structure



Visit

Proposal 16365, SK-69D43-STIS-E230M (DS), scheduling Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/NUV-MAMA, STIS/CCD

Special Requirements: SCHED 100%

Comments: vstatus; 4S; SK-69D43; P/STIS Approved for submission; P/DW 20/01/21 ; intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; SK-69D43 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no
vcheck; S/N ETC calcs done & documented?; yes ...
acq -- F28x50LP / 0.5 sec gives S/N~189 --
e140m -- IUE spectrum / 7300 sec gives S/N~19 at 1200 A -- brightest 0.052 cts/s -- global 2460+157 cts/s --
e230m -- IUE spectrum / 2200 sec gives S/N>~18 at 1800 A -- brightest 0.184 cts/s -- global 3368+2307 cts/s
vcheck; Field images checked & saved?; yes -- though no HST images are available
vcheck; Selected ACQ strategy?; yes -- point source, F28x50LP
vcheck; Possible ACQ or Sci spoilers?; no -- target appears to be single, clearance region is largely within the saturated core of the target (DSS, 2MASS)
vcheck; Field BOT clear?; yes -- GSC2 indicates 1 safe (target), GALEX not covered
vcheck; Visual BOT check for stars not in catalog?; yes
vcheck; Orbit packing finalized?; yes -- 3 for e140m, 1 for e230m
vcheck; Buffer times optimized?; yes -- e140m: 472x0.8=378 sec -- e230m: 304x0.8=243 sec
vcheck; Verify visit grouping correct; within 30 days of 3S
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 4 (3 at e140m +1 at e230m)

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(3)	SK-69D43	RA: 04 56 10.4639 (74.0435996d)	Proper Motion RA: 0 sec of time/yr	V=11.96	Reference Frame: ICRS
	Alt Name1: SK-6943	Dec: -69 15 38.30 (-69.26064d)	Proper Motion Dec: 0 arcsec/yr	SpT=B0.5Ia; E(B-V)=0.13; U=10.8; B=11.9; V=12.0; F1160=8.64e-13; F1360=7.46e-13; F1700=5.80e-13; F2200=3.80e-13	
	Alt Name2: SK-69-43	Equinox: J2000			

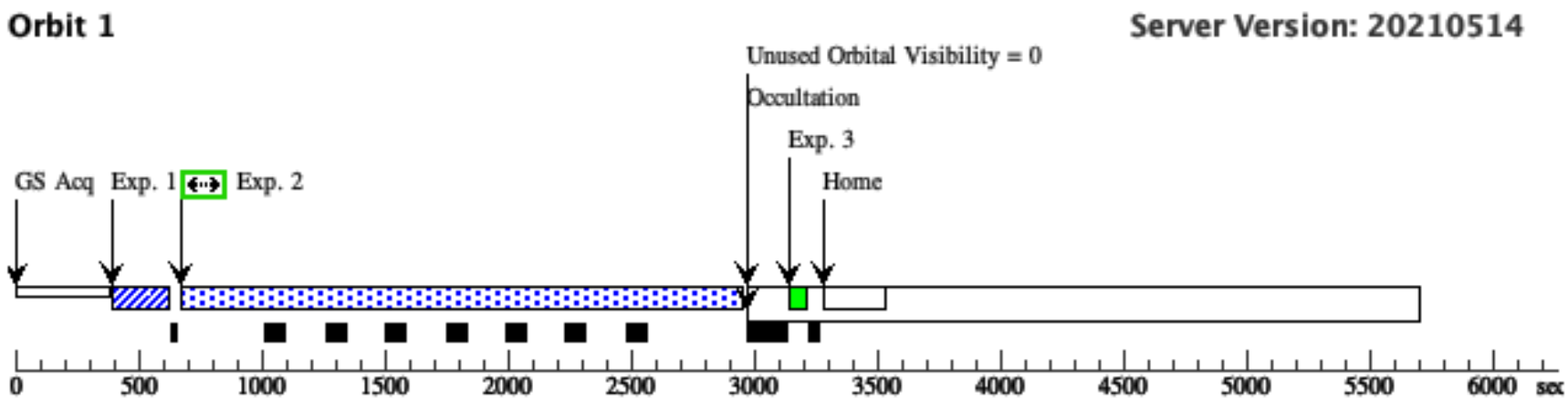
Comments: SK-69D43 : HD268809, HD_268809, SK-6943, SK -69 43
Previous name : HD268809
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -69 43): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-69+43&submit=submit+id
SpT = B0.5Ia
COS/G130M/c1096 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1160 +- 30.0A flux=8.6e-13 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1700 +- 5.0A flux=5.8e-13 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux1360 +- 30.0A flux=7.5e-13 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam)
Coordinate pedigree: Gaia
v sin i = 102
Calculation performed 2020-02-24T17:49:35, v0.4
---
tstatus; SK-69D43; P/STIS Approved for submission; S/ins not started; P/DW 20/01/21; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-69D43 'Sk-69 43' ...
aka HD268809
tcheck; Target info verification status?; coordinates ok ...
spectral type and photometry ok -- B1 Ia, UBV = 10.96,11.88,11.96 -- E(B-V)=0.11
tcheck; Coordinates & P.M. updated?; yes, PM set to zero
tcheck; Adopted SED compared to Observations?; yes ...
original SED was a bit too low below 1500 A (compared to FUSE, IUE -- though in better agreement with FOS), and about 50% lower than IUE above 2100 A (and for UBV) --
new SED uses F(1360)=9e-13 and E(B-V)=0.12 -- it is between IUE and FOS below 1500 A, higher from 1600-1750 A, and lower (by ~40%) above 2100 A (including UBV)
Category=EXT-STAR
Description=[B0-B2 III-I]
Extended=NO

Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1474384)	(3) SK-69D43	STIS/CCD, ACQ, F28X50LP	MIRROR				0.5 Secs (0.5 Secs) *[==>]*	*[1]*
2	E230M/1978 (1474392)	(3) SK-69D43	STIS/NUV-MAMA, TIME-TAG, 0.2X0.2	E230M 1978 A	WAVECAL=NO; BUFFER-TIME=243.0			2164 Secs (2164 Secs) *[==>]*	*[1]*
3	E230M/1978 WAVECAL	WAVE	STIS/NUV-MAMA, ACCUM, 0.2X0.2	E230M 1978 A				*[==>]*	*[1]*

Comments: rn-max(WM-Basic(B0.5 I, Z=0.008, Teff=24547, log_lum=5.40, log_g=2.95) (extinction lmcavg=0.130), flux2200 +- 5.0A flux=3.8e-13 Flam); stis,nuvmama,e230m,c1978,0.2x0.2,mjd#59305
From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
Spectral type: B0.5Ia --> B0.5 I
SED = SK-69D43_STIS_E230M_c1978_sed.fits
For exptime=1799.1 s, spectral region:
1800.0 +- 0.5 A achieves SNR=20.0/resel
global countrate (brightest segment): 7395.1 cts/s/segment
brightest pixel: 0.141 cts/s/pix at 2319.0 A
Calculation performed 2020-02-24T17:49:48, v0.4

Orbit Structure



Visit

Proposal 16365, SK-70D32-STIS (5S), failed Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/CCD, STIS/FUV-MAMA

Special Requirements: SCHED 100%

Comments: vstatus; 4S; SK-70D32; P/STIS Approved for submission; P/DW 21/01/21 ; intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; SK-70D32 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no
vcheck; S/N ETC calcs done & documented?; yes ...
acq: point source, F28x50LP, 1 sec yields S/N~159 (B0 I model, V=13.06, E(B-V)=0.09) --
e140m: IUE spectrum, 0.2x0.2, 7345 sec yields S/N>34 near 1255 A, S/N~21 at 1200 A, brightest pix 0.056 cts/s, global 2618+157 cts/s
vcheck; Field images checked & saved?; yes -- DSS, 2MASS, GALEX
vcheck; Selected ACQ strategy?; yes -- point source, F28x50LP, 1 sec
vcheck; Possible ACQ or Sci spoilers?; no
vcheck; Field BOT clear?; yes -- GSC2 has 1 safe (target) -- there is a GALEX source, but it is not catalogued
vcheck; Visual BOT check for stars not in catalog?; yes -- clearance region nearly filled with saturated core of target (which appears to be single)
vcheck; Orbit packing finalized?; yes
vcheck; Buffer times optimized?; yes -- adopted 345 sec (355 from IUE, 341 from new SED)
vcheck; Verify visit grouping correct; n/a (only one visit)
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 3

Fixed Targets

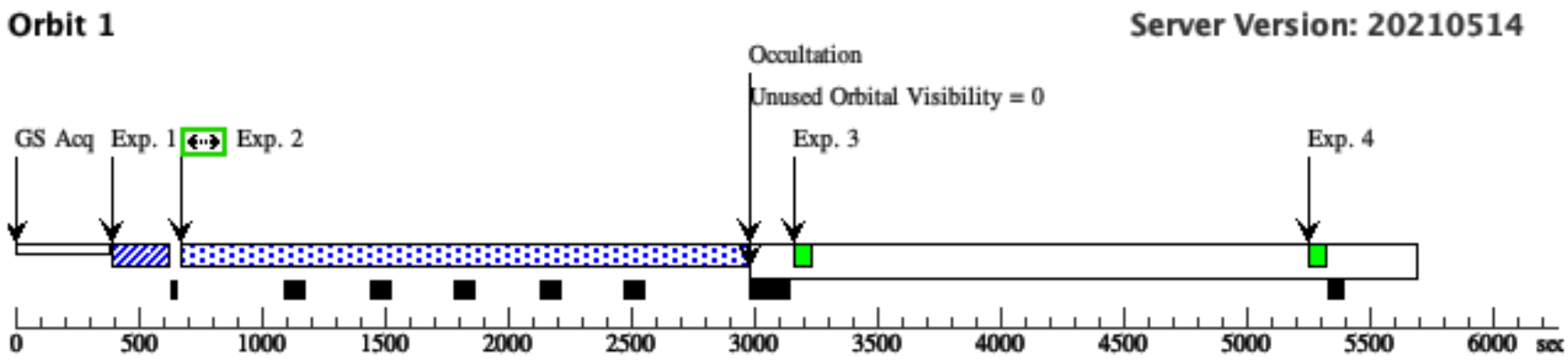
#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(4)	SK-70D32	RA: 05 00 10.2101 (75.0425421d)	Proper Motion RA: 0 sec of time/yr	V=13.06	Reference Frame: ICRS
	Alt Name1: SK-70-32	Dec: -70 11 9.43 (-70.18595d)	Proper Motion Dec: 0 arcsec/yr	SpT=O9.5 II:; E(B-V)=0.05; U=11.8; B=12.8; V=13.1; F1160=7.73e-13	
	Alt Name2: M2002-46268	Equinox: J2000			

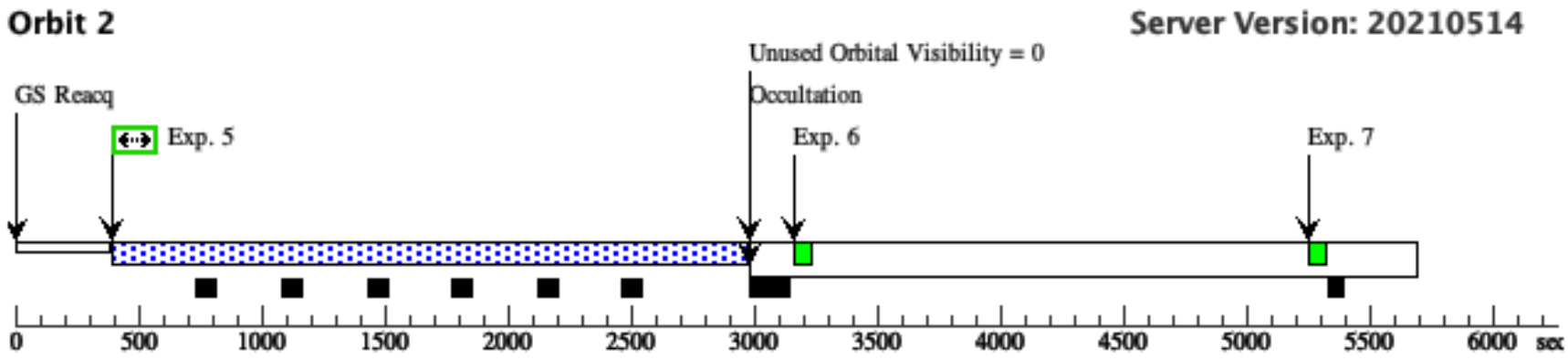
Comments: SK-70D32 : [M2002]_46268, Sk -70 32, SK -70 32
Previous name : Sk -70 32
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -70 32): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-70+32&submit=submit+id
SpT = O9.5 II:
COS/G130M/c1096 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
Coordinate pedigree: Gaia
v sin i = 97
Calculation performed 2020-02-24T18:07:40, v0.4
----
tstatus; SK-70D32; P/STISApproved for submission; S/ins not started; P/DW 21/01/21; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-70D32 'Sk-70 32'
tcheck; Target info verification status?; coordinates ok, spectral type and photometry ok ...
Massey et al. 2002 give UBV = 11.84,12.85,13.06 -- so B-V=-0.21 and E(B-V)=0.09 and average of other refs has UBV = 11.88,12.89,13.10 -- again yielding B-V=-0.21
tcheck; Coordinates & P.M. updated?; yes, PM set to zero
tcheck; Adopted SED compared to Observations?; yes ...
original SED was too low over most of the spectral range, with E(B-V) too small (0.05) --
new SED has F(1360)=0.9e-12 and E(B-V)=0.09 -- ok from 1300-1500 A, higher than IUE from 1550-1750 A, ok beyond that
Category=EXT-STAR
Description=[SUPERGIANT O]
Extended=NO

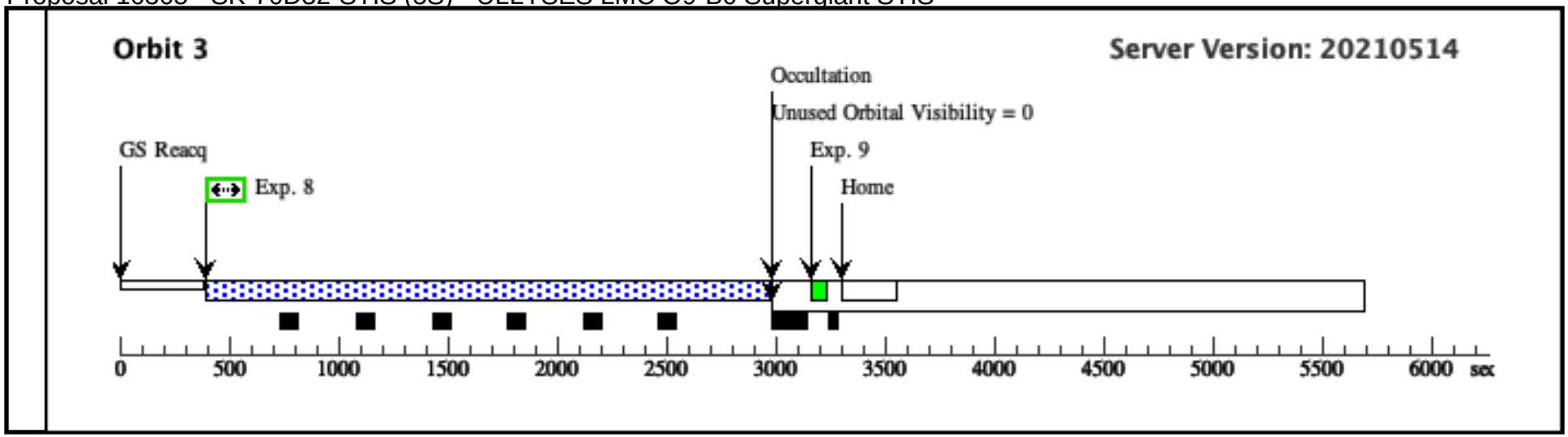
Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1474518)	(4) SK-70D32	STIS/CCD, ACQ, F28X50LP	MIRROR				1 Secs (1 Secs) *[==>]*	*[1]*
2	E140M/1425 (1474519)	(4) SK-70D32	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=345.0		Sequence 2-3 Non-Int in SK-70D32-STIS (5S)	2211 Secs (2211 Secs) *[==>]*	*[1]*
	Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9.5 II: --> O9.5 I* *SED = SK-70D32_STIS_E140M_c1425_sed.fits* *For exptime=5805.6 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 3559.0 cts/s/segment* *brightest pixel: 0.039 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:50, v0.4*								
3	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 2-3 Non-Int in SK-70D32-STIS (5S)	*[==>]*	*[1]*
4	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-70D32-STIS (5S)	*[==>]*	*[1]*
5	E140M/1425 (1474519)	(4) SK-70D32	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=345.0		Sequence 4-6 Non-Int in SK-70D32-STIS (5S)	2567 Secs (2567 Secs) *[==>]*	*[2]*
	Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9.5 II: --> O9.5 I* *SED = SK-70D32_STIS_E140M_c1425_sed.fits* *For exptime=5805.6 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 3559.0 cts/s/segment* *brightest pixel: 0.039 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:50, v0.4*								
6	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-70D32-STIS (5S)	*[==>]*	*[2]*
7	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-70D32-STIS (5S)	*[==>]*	*[2]*
8	E140M/1425 (1474519)	(4) SK-70D32	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=345.0		Sequence 7-9 Non-Int in SK-70D32-STIS (5S)	2567 Secs (2567 Secs) *[==>]*	*[3]*
	Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9.5 II: --> O9.5 I* *SED = SK-70D32_STIS_E140M_c1425_sed.fits* *For exptime=5805.6 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 3559.0 cts/s/segment* *brightest pixel: 0.039 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:50, v0.4*								
9	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-70D32-STIS (5S)	*[==>]*	*[3]*

Orbit Structure



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Occultation
Unused Orbital Visibility = 0
GS Reacq
Exp. 8
Exp. 9
Home
0
500
1000
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2000
2500
3000
3500
4000
4500
5000
5500
6000
sec

Visit

Proposal 16365, SK-70D32-STIS (ES) Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/CCD, STIS/FUV-MAMA

Special Requirements: SCHED 100%

Comments: vstatus; ES; SK-70D32; P/STIS Approved for submission; P/DW 21/01/21 ; intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; SK-70D32 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no
vcheck; S/N ETC calcs done & documented?; yes ...
acq: point source, F28x50LP, 1 sec yields S/N~159 (B0 I model, V=13.06, E(B-V)=0.09) --
e140m: IUE spectrum, 0.2x0.2, 7345 sec yields S/N>34 near 1255 A, S/N~21 at 1200 A, brightest pix 0.056 cts/s, global 2618+157 cts/s
vcheck; Field images checked & saved?; yes -- DSS, 2MASS, GALEX
vcheck; Selected ACQ strategy?; yes -- point source, F28x50LP, 1 sec
vcheck; Possible ACQ or Sci spoilers?; no
vcheck; Field BOT clear?; yes -- GSC2 has 1 safe (target) -- there is a GALEX source, but it is not catalogued
vcheck; Visual BOT check for stars not in catalog?; yes -- clearance region nearly filled with saturated core of target (which appears to be single)
vcheck; Orbit packing finalized?; yes
vcheck; Buffer times optimized?; yes -- adopted 345 sec (355 from IUE, 341 from new SED)
vcheck; Verify visit grouping correct; n/a (only one visit)
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 3

this is a repeat of visit 5S, for which the guide star acquisition failed, resulting in very poor data

Fixed Targets

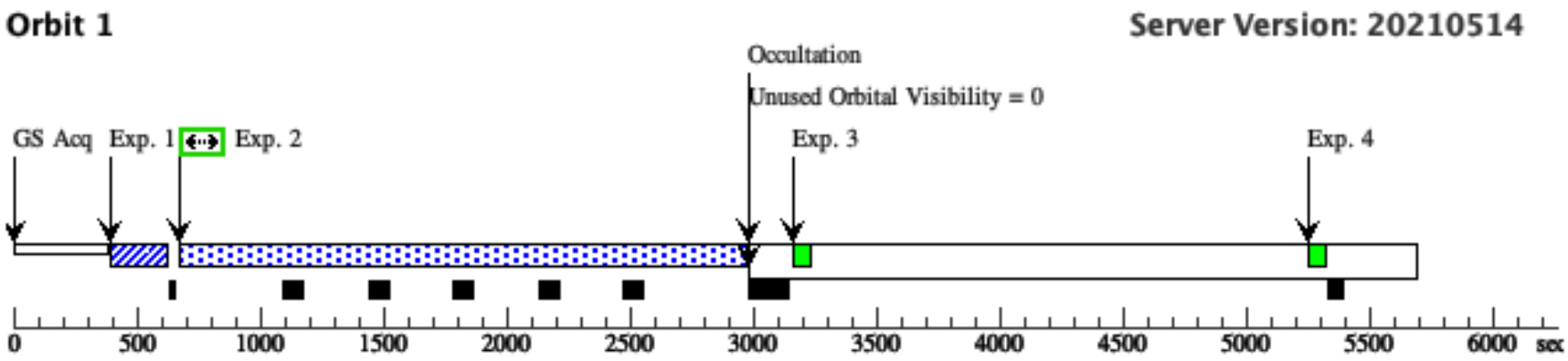
#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(4)	SK-70D32	RA: 05 00 10.2101 (75.0425421d)	Proper Motion RA: 0 sec of time/yr	V=13.06	Reference Frame: ICRS
	Alt Name1: SK-70-32	Dec: -70 11 9.43 (-70.18595d)	Proper Motion Dec: 0 arcsec/yr	SpT=O9.5 II:; E(B-V)=0.05; U=11.8; B=12.8; V=13.1; F1160=7.73e-13	
	Alt Name2: M2002-46268	Equinox: J2000			

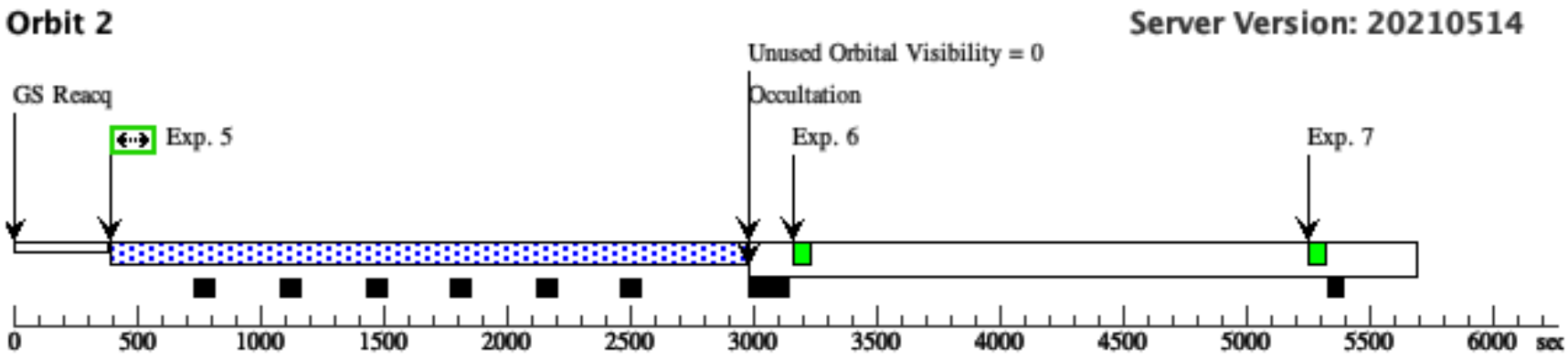
Comments: SK-70D32 : [M2002]_46268, Sk -70 32, SK -70 32
Previous name : Sk -70 32
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -70 32): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-70+32&submit=submit+id
SpT = O9.5 II:
COS/G130M/c1096 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam)
Coordinate pedigree: Gaia
v sin i = 97
Calculation performed 2020-02-24T18:07:40, v0.4
---
tstatus; SK-70D32; P/STISApproved for submission; S/ins not started; P/DW 21/01/21; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-70D32 'Sk-70 32'
tcheck; Target info verification status?; coordinates ok, spectral type and photometry ok ...
Massey et al. 2002 give UBV = 11.84,12.85,13.06 -- so B-V=-0.21 and E(B-V)=0.09 and average of other refs has UBV = 11.88,12.89,13.10 -- again yielding B-V=-0.21
tcheck; Coordinates & P.M. updated?; yes, PM set to zero
tcheck; Adopted SED compared to Observations?; yes ...
original SED was too low over most of the spectral range, with E(B-V) too small (0.05) --
new SED has F(1360)=0.9e-12 and E(B-V)=0.09 -- ok from 1300-1500 A, higher than IUE from 1550-1750 A, ok beyond that
Category=EXT-STAR
Description=[SUPERGIANT O]
Extended=NO

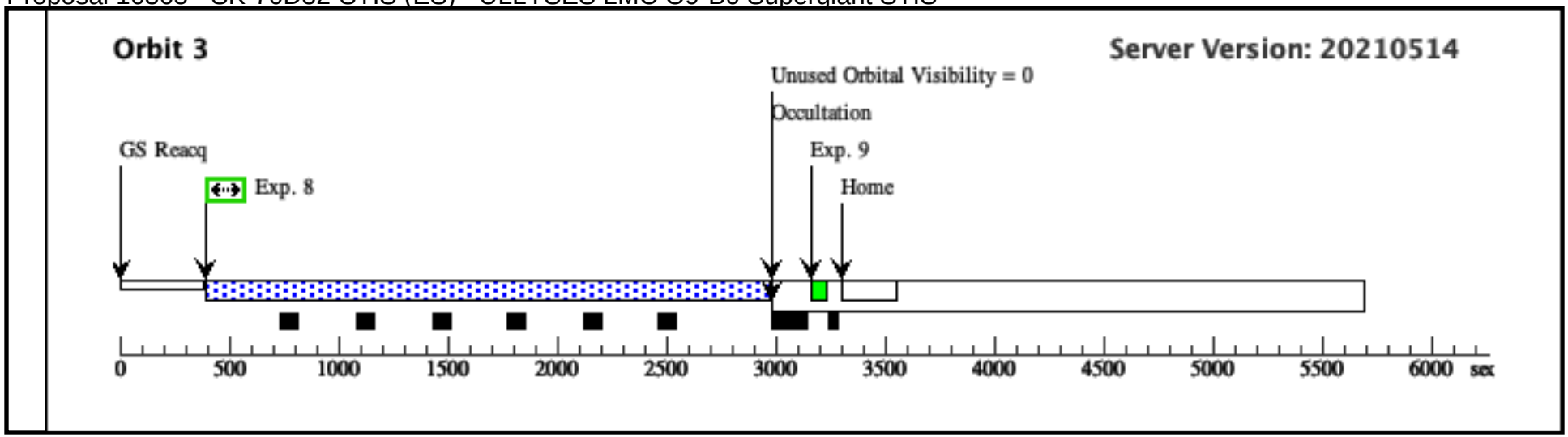
Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1474518)	(4) SK-70D32	STIS/CCD, ACQ, F28X50LP	MIRROR				1 Secs (1 Secs) *[==>]*	***[1]***
2	E140M/1425 (1474519)	(4) SK-70D32	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=345.0		Sequence 2-3 Non-Int in SK-70D32-STIS (ES)	2211 Secs (2211 Secs) *[==>]*	***[1]***
	Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9.5 II: --> O9.5 I* *SED = SK-70D32_STIS_E140M_c1425_sed.fits* *For exptime=5805.6 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 3559.0 cts/s/segment* *brightest pixel: 0.039 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:50, v0.4*								
3	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 2-3 Non-Int in SK-70D32-STIS (ES)	*[==>]*	***[1]***
4	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-70D32-STIS (ES)	*[==>]*	***[1]***
5	E140M/1425 (1474519)	(4) SK-70D32	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=345.0		Sequence 4-6 Non-Int in SK-70D32-STIS (ES)	2567 Secs (2567 Secs) *[==>]*	***[2]***
	Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9.5 II: --> O9.5 I* *SED = SK-70D32_STIS_E140M_c1425_sed.fits* *For exptime=5805.6 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 3559.0 cts/s/segment* *brightest pixel: 0.039 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:50, v0.4*								
6	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-70D32-STIS (ES)	*[==>]*	***[2]***
7	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-70D32-STIS (ES)	*[==>]*	***[2]***
8	E140M/1425 (1474519)	(4) SK-70D32	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=345.0		Sequence 7-9 Non-Int in SK-70D32-STIS (ES)	2567 Secs (2567 Secs) *[==>]*	***[3]***
	Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.050), flux1160 +- 30.0A flux=7.7e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9.5 II: --> O9.5 I* *SED = SK-70D32_STIS_E140M_c1425_sed.fits* *For exptime=5805.6 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 3559.0 cts/s/segment* *brightest pixel: 0.039 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:50, v0.4*								
9	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-70D32-STIS (ES)	*[==>]*	***[3]***

Orbit Structure



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Occultation
GS Reacq
Exp. 8
Exp. 9
Home
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1000
1500
2000
2500
3000
3500
4000
4500
5000
5500
6000
sec

Visit

Proposal 16365, SK-71D8-STIS (6S), completed Fri Jan 28 21:00:35 GMT 2022

Diagnostic Status: No Diagnostics

Scientific Instruments: STIS/CCD, STIS/FUV-MAMA

Special Requirements: SCHED 100%

Comments: vstatus; 5S; SK-71D8; P/STIS Approved for submission; P/DW 21/01/21 ; intrev: intrev: complete ; P/CP 22/03/21
vcheck; Enter targ name & Inst. & Resp. Sci.; Sk-71D8 ; STIS ; DW
vcheck; ETC numbers entered in APT?; yes
vcheck; Any screening violations?; no -- GSC2 has 1 safe object (target) -- GALEX listed no objects, but there is emission
vcheck; S/N ETC calcs done & documented?; yes ...
acq: F28x50LP / B0 I model / V=13.25 / E(B-V)=0.15 / 1 sec yields S/N~149 --
e140m: new SED /0.2x0.2 / 7345 sec yields S/N>27 at 1255 A, S/N~21 at 1200 A -- brightest pix 0.037 cts/s, global 1907+157 cts/s
vcheck; Field images checked & saved?; yes -- DSS, 2MASS, GALESX
vcheck; Selected ACQ strategy?; point source, F28x50LP, 1 sec
vcheck; Possible ACQ or Sci spoilers?; no -- target appears single, symmetric in DSS, 2MASS images
vcheck; Field BOT clear?; GSC2 has 1 safe (target), GALEX no object listed (though there is coverage and sources are present)
vcheck; Visual BOT check for stars not in catalog?; yes -- saturated core of target fills most of clearance region in DSS, no other obvious objects present
vcheck; Orbit packing finalized?; yes
vcheck; Buffer times optimized?; yes -- 0.8 x 602 = 480 sec
vcheck; Verify visit grouping correct; n/a (only one visit)
vcheck; Is visit ready for int. review?; yes
Allocated STIS orbits = 3

Fixed Targets

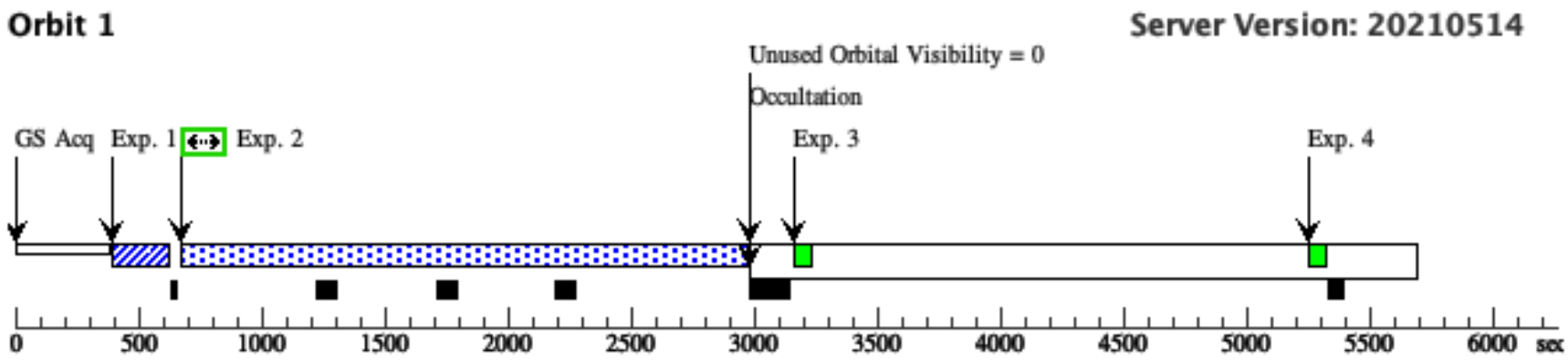
#	Name	Target Coordinates	Targ. Coord. Corrections	Fluxes	Miscellaneous
(5)	SK-71D8	RA: 05 07 23.2654 (76.8469392d)	Proper Motion RA: 0 sec of time/yr	V=13.16	Reference Frame: ICRS
	Alt Name1: SK-71-8	Dec: -71 11 53.96 (-71.19832d)	Proper Motion Dec: 0 arcsec/yr	SpT=O9 II; E(B-V)=0.09; U=12.2; B=13.0; V=13.2; F1160=5.45 e-13	
	Alt Name2: SK-718	Equinox: J2000			

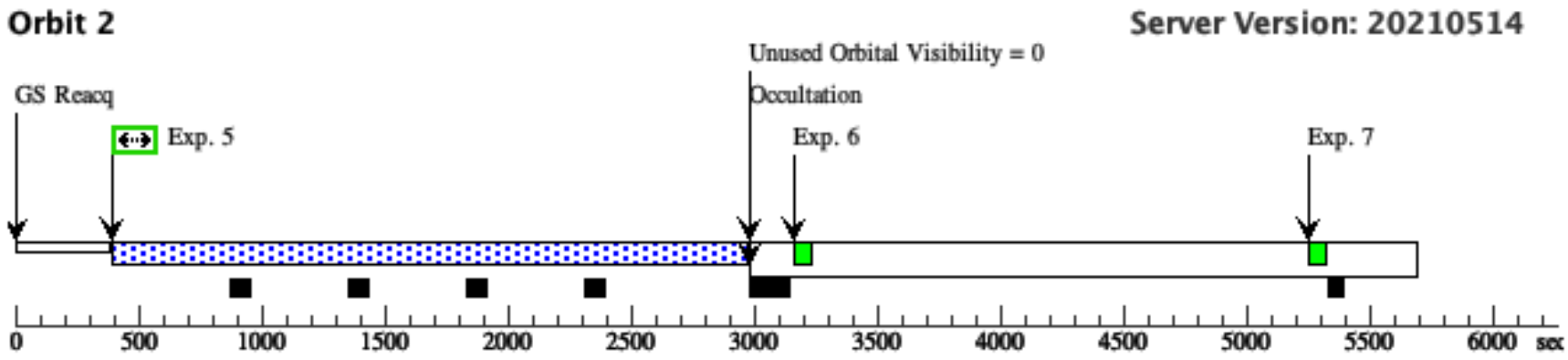
Comments: SK-71D8 : Sk -71 8, Sk_-718, SK -71 8
Previous name : Sk -71 8
Input file: LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv
SIMBAD link (SK -71 8): https://simbad.u-strasbg.fr/simbad/sim-id?Ident=SK+-71+8&submit=submit+id
SpT = O9 II
COS/G130M/c1096 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
COS/G130M/c1291 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
COS/G160M/c1611 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
COS/G185M/c1921 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
COS/G185M/c1953 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
COS/G185M/c1986 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
STIS/E140M/c1425 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
STIS/E230M/c1978 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
STIS/E230M/c2707 : rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam)
Coordinate pedigree: Gaia
v sin i = 75
Calculation performed 2020-02-24T18:07:28, v0.4
---
tstatus; SK-71D8; P/STIS Approved for submission; S/ins not started; P/DW 21/01/21; S/xx DD/MM/YY
tcheck; APT/SIMBAD target names: ; SK-71D8 'Sk-71 8'
tcheck; Target info verification status?; coordinates ok, spectral type and photometry ok ...
Isserstedt gives UBV = 12.15,13.11,13.25 -- so B-V=-0.14 and E(B-V)=0.17
tcheck; Coordinates & P.M. updated?; yes, PM set to zero
tcheck; Adopted SED compared to Observations?; yes ...
E(B-V) for original SED was too small (0.09), and did not fit the FUSE data well at the shorter wavelengths --
new SED uses E(B-V)=0.15 (and a different normalization), and yields a better match (with somewhat higher flux for e140m)
Category=EXT-STAR
Description=[SUPERGIANT O]
Extended=NO

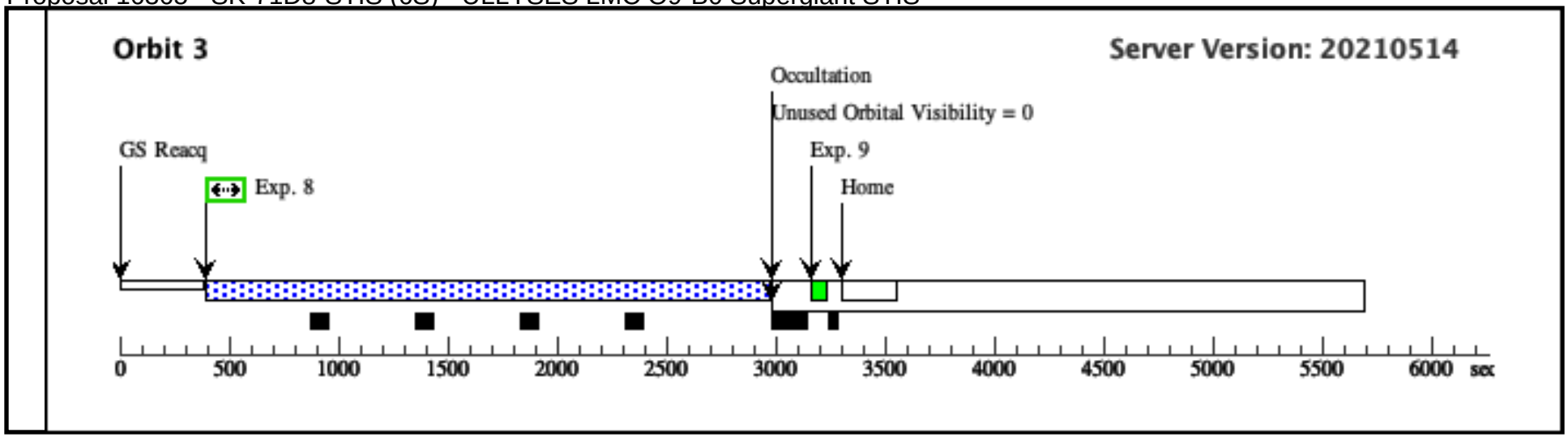
Exposures

#	Label (ETC Run)	Target	Config,Mode,Aperture	Spectral Els.	Opt. Params.	Special Reqs.	Groups	Exp. Time (Total)/[Actual Dur.]	Orbit
1	ACQ (1474524)	(5) SK-71D8	STIS/CCD, ACQ, F28X50LP	MIRROR				1 Secs (1 Secs) *[==>]*	*[1]*
2	E140M/1425 (1474525)	(5) SK-71D8	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=480.0		Sequence 2-3 Non-Int in SK-71D8-STIS (6S)	2211 Secs (2211 Secs) *[==>]*	*[1]*
								Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9 II --> O9.5 I* *SED = SK-71D8_STIS_E140M_c1425_sed.fits* *For exptime=8113.2 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 2802.7 cts/s/segment* *brightest pixel: 0.031 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:39, v0.4*		
3	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 2-3 Non-Int in SK-71D8-STIS (6S)	*[==>]*	*[1]*
4	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-71D8-STIS (6S)	*[==>]*	*[1]*
5	E140M/1425 (1474525)	(5) SK-71D8	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=480.0		Sequence 4-6 Non-Int in SK-71D8-STIS (6S)	2567 Secs (2567 Secs) *[==>]*	*[2]*
								Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9 II --> O9.5 I* *SED = SK-71D8_STIS_E140M_c1425_sed.fits* *For exptime=8113.2 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 2802.7 cts/s/segment* *brightest pixel: 0.031 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:39, v0.4*		
6	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 4-6 Non-Int in SK-71D8-STIS (6S)	*[==>]*	*[2]*
7	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-71D8-STIS (6S)	*[==>]*	*[2]*
8	E140M/1425 (1474525)	(5) SK-71D8	STIS/FUV-MAMA, TIME-TAG, 0.2X0.2	E140M 1425 A	WAVECAL=NO; BUFFER-TIME=480.0		Sequence 7-9 Non-Int in SK-71D8-STIS (6S)	2567 Secs (2567 Secs) *[==>]*	*[3]*
								Comments: rn-max(WM-Basic(O9.5 I, Z=0.008, Teff=32359, log_lum=5.81, log_g=3.23) (extinction lmcavg=0.090), flux1160 +- 30.0A flux=5.5e-13 Flam); stis,fuvmama,e140m,c1425,0.2x0.2,mjd#59305 *From file LMC_2020Feb20/input/LMC_all_do1_fixed_wr_NewCoords_pids.csv* *Spectral type: O9 II --> O9.5 I* *SED = SK-71D8_STIS_E140M_c1425_sed.fits* *For exptime=8113.2 s, spectral region:* *1200.0 +- 0.5 A achieves SNR=20.0/resel* *global countrate (brightest segment): 2802.7 cts/s/segment* *brightest pixel: 0.031 cts/s/pix at 1407.4 A* *Calculation performed 2020-02-24T18:07:39, v0.4*		
9	E140M/1425 WAVECAL	WAVE	STIS/FUV-MAMA, ACCUM, 0.2X0.2	E140M 1425 A			Sequence 7-9 Non-Int in SK-71D8-STIS (6S)	*[==>]*	*[3]*

Orbit Structure






Orbit 3
Server Version: 20210514
Occultation
Unused Orbital Visibility = 0
GS Reacq
Exp. 8
Exp. 9
Home
0
500
1000
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2000
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sec