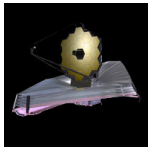

7075 - Kepler's Supernova Remnant: New fundamental Insights into Type Ia Supernova Explosions

Cycle: 4, Proposal Category: GO

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OBSERVATIONS

Folder	*Observation*	*Label*	*Observing Template*	*Science Target*
Observation Folder				
	1	MIRI imaging	MIRI Imaging	(1) KEPLER-SNR

Folder	*Observation*	*Label*	*Observing Template*	*Science Target*
	2	MIRI Imaging Background	MIRI Imaging	(5) BACKGROUND
	3	NIRCam imaging	NIRCam Imaging	(1) KEPLER-SNR
	4	NIRSpec IFU-A	NIRSpec IFU Spectroscopy	(2) IFU-A
	5	NIRSpec IFU-B	NIRSpec IFU Spectroscopy	(3) IFU-B
	6	NIRSpec IFU-C	NIRSpec IFU Spectroscopy	(4) IFU-C
	7	NIRSpec IFU background	NIRSpec IFU Spectroscopy	(5) BACKGROUND
	8	MIRI IFU-A	MIRI Medium Resolution Spectroscopy	(2) IFU-A
	9	MIRI IFU-B	MIRI Medium Resolution Spectroscopy	(3) IFU-B
	10	MIRI IFU-C	MIRI Medium Resolution Spectroscopy	(4) IFU-C
	11	MIRI IFU background	MIRI Medium Resolution Spectroscopy	(5) BACKGROUND

ABSTRACT

Type Ia supernovae (SNe) have fundamental consequences in a broad range of astrophysical topics, and hence the identification of their unknown explosion mechanisms and progenitor systems is ranked among the most important problems of stellar astrophysics. Widely believed to be the result of the thermonuclear combustion of a carbon-oxygen white dwarf that is destabilized through the interaction with a companion star, whether or not that companion is degenerate and whether it survives are all critical unanswered questions despite numerous extragalactic SN Ia studies.

JWST's resolution and sensitivity open new pathways to investigate the nature of SNe Ia via spatially resolved observations of young, nearby Galactic Ia SN remnants. One extraordinary SN Ia remnant, Kepler’s SNR (SN 1604), best highlights the issue about whether SNe Ia have single or double degenerate progenitors (SD vs DD): its circumstellar medium suggests a SD channel, whereas the lack of a surviving donor star is best explained by the DD scenario. We propose a JWST imaging and spectroscopy survey of Kepler's SNR that will: 1) greatly improve characterization of the SN ejecta, CSM, and dust over previous studies, 2) test the leading hypothesis that its dust properties require a 4-6 Msun AGB star that is no longer present, and 3) map the distribution of C+O material to distinguish between SNe Ia explosion models. Our results results will help interpret JWST observations of unresolved extragalactic SNe Ia, be synergistic with new XRISM observations, and provide tests of 3D simulations that evolve SNe Ia to the remnant phase.

OBSERVING DESCRIPTION

Imaging mosaics will be obtained with NIRCam + MIRI covering the entire Kepler supernova remnant (SNR). NIRCam filters F070W, F162M, F356W, and F444W have been selected to map shocks, Fe and Si emission from CSM and ejecta, potential CO molecular emission, and synchrotron emission. MIRI filters F770W, F1280W, F1800W, F2100W, and F2550W will sample and differentiate ejecta, CSM, and dust. Mosaic configurations have been carefully selected to optimally cover the entire remnant. NIRSpec IFU + MIRI MRS spectroscopy of three representative locations will also be obtained. NIRSpec observations will use the G395M, and the MIRI-MRS observation will span the full 5-28 micron range over multiple exposures. IFU observations will be obtained no sooner than 60 days after imaging to allow time for analysis of mosaics and determination of precise locations across the SNR. IFU observations will be obtained no later than 210 days after imaging to minimize changes in emission resulting from expansion of the SNR.

Proposal 7075 - Targets - Kepler's Supernova Remnant: New fundamental Insights into Type Ia Supernova Explosions

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(1)	KEPLER-SNR	RA: 17 30 40.5900 (262.6691250d) Dec: -21 29 17.90 (-21.48831d) Equinox: J2000		
Comments: *Category=ISM* *Description=[Supernova remnants]* *Extended=YES*				
(2)	IFU-A	RA: 17 30 41.7042 (262.6737675d) Dec: -21 29 43.51 (-21.49542d) Equinox: J2000		
Comments: *Category=ISM* *Description=[Supernova remnants]* *Extended=YES*				
(3)	IFU-B	RA: 17 30 36.3793 (262.6515804d) Dec: -21 28 33.02 (-21.47584d) Equinox: J2000		
Comments: *Category=ISM* *Description=[Supernova remnants]* *Extended=YES*				
(4)	IFU-C	RA: 17 30 44.0285 (262.6834521d) Dec: -21 28 1.78 (-21.46716d) Equinox: J2000		
Comments: *Category=ISM* *Description=[Supernova remnants]* *Extended=YES*				
(5)	BACKGROUND	RA: 17 31 5.6000 (262.7733333d) Dec: -21 36 45.00 (-21.61250d) Equinox: J2000		
Comments: *Category=Calibration* *Description=[Telescope/sky background]* *Extended=YES*				

Observation

Proposal 7075, Observation 1: MIRI imaging

Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: MIRI Imaging

Diagnostics

(Visit 1:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:2) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:3) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:4) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:5) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:6) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:7) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:8) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:9) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:10) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:11) Warning (Form): Overheads are provisional until the Visit Planner has been run.
(Visit 1:12) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(1)	KEPLER-SNR	RA: 17 30 40.5900 (262.6691250d) Dec: -21 29 17.90 (-21.48831d) Equinox: J2000		

Comments:
Category=ISM
Description=[Supernova remnants]
Extended=YES

Template

Subarray
FULL

Mosaic

Rows	Columns	Row Overlap %	Column Overlap %	Row shift (deg)	Column shift (deg)	Tile Order
3	4	15.0	15.0	0.0	0.0	DEFAULT

Dithers

#	Dither Type	Starting Point	Number of Points	Points	Starting Set	Number of Sets	Optimized For	Direction	Pattern Size
1	4-Point-Sets				6	1	EXTENDED SOURCE	POSITIVE	DEFAULT

Spectral Elements

#	Filter	Readout Pattern	Groups/Int	Integrations/Exp	Exposures/Dith	Dither	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1	F770W	FASTR1	8	1	1	Dither 1	4	4	88.801	
2	F1280W	FASTR1	8	1	1	Dither 1	4	4	88.801	
3	F1800W	FASTR1	8	1	1	Dither 1	4	4	88.801	
4	F2100W	FASTR1	8	1	1	Dither 1	4	4	88.801	
5	F2550W	FASTR1	8	1	1	Dither 1	4	4	88.801	

Special Requirements	
	Group Visits within 53.0 Days Visits Same PA Sequence Observations 1, 2, Non-interruptible

Observation

Proposal 7075, Observation 2: MIRI Imaging Background Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: MIRI Imaging

Background Observation For: []

Diagnostics

(Visit 2:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(5)	BACKGROUND	RA: 17 31 5.6000 (262.7733333d) Dec: -21 36 45.00 (-21.61250d) Equinox: J2000		

Comments:
Category=Calibration
Description=[Telescope/sky background]
Extended=YES

Template

Subarray
FULL

Dithers

#	Dither Type	Starting Point	Number of Points	Points	Starting Set	Number of Sets	Optimized For	Direction	Pattern Size
1	4-Point-Sets				6	1	EXTENDED SOURCE	POSITIVE	DEFAULT

Spectral Elements

#	Filter	Readout Pattern	Groups/Int	Integrations/Exp	Exposures/Dith	Dither	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1	F770W	FASTR1	8	1	1	Dither 1	4	4	88.801	
2	F1280W	FASTR1	8	1	1	Dither 1	4	4	88.801	
3	F1800W	FASTR1	8	1	1	Dither 1	4	4	88.801	
4	F2100W	FASTR1	8	1	1	Dither 1	4	4	88.801	
5	F2550W	FASTR1	8	1	1	Dither 1	4	4	88.801	

Special Requirements

8 After 2 by 60 Days to 210 Days
Sequence Observations 1, 2, Non-interruptible

Observation

Proposal 7075, Observation 3: NIRCam imaging Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: NIRCam Imaging

Diagnostics

(NIRCam imaging (Obs 3)) Warning (Form): By selecting Target Placement = Module Gap the target coordinates will not fall on any detector unless an appropriate Mosaic, set of Dithers or Offset Special Requirement is specified.

(Visit 3:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

(Visit 3:2) Warning (Form): Overheads are provisional until the Visit Planner has been run.

(Visit 3:3) Warning (Form): Overheads are provisional until the Visit Planner has been run.

(Visit 3:4) Warning (Form): Overheads are provisional until the Visit Planner has been run.

(Visit 3:5) Warning (Form): Overheads are provisional until the Visit Planner has been run.

(Visit 3:6) Warning (Form): Overheads are provisional until the Visit Planner has been run.

(Visit 3:7) Warning (Form): Overheads are provisional until the Visit Planner has been run.

(Visit 3:8) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(1)	KEPLER-SNR	RA: 17 30 40.5900 (262.6691250d) Dec: -21 29 17.90 (-21.48831d) Equinox: J2000		

Comments:
Category=ISM
Description=[Supernova remnants]
Extended=YES

Template

Module	Subarray	Target Placement
ALL	FULL	Module gap (large extended source)

Mosaic

Rows	Columns	Row Overlap %	Column Overlap %	Row shift (deg)	Column shift (deg)	Tile Order
2	1	10.0	10.0	0.0	0.0	DEFAULT

Dithers

#	Primary Dither Type	Primary Dithers	Subpixel Dither Type	Dither Size	Subpixel Positions
1	FULL	3TIGHT	STANDARD		4

Spectral Elements

#	Short Filter	Long Filter	Readout Pattern	Groups/Int	Integrations/Exp	Total Integrations	Total Dithers	Total Exposure Time	Optional ETC ID
1	F070W	F356W	BRIGHT1	7	1	12	12	1674.936	
2	F162M+F150W2	F444W	BRIGHT1	7	1	12	12	1674.936	

Special Requirements	
	Sequence Visits within 53.0 Days Visits Same PA 4 After 3 by 60 Days to 210 Days

Observation

Proposal 7075, Observation 4: NIRSpec IFU-A Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: NIRSpec IFU Spectroscopy

Background Observations:[NIRSpec IFU background (Obs 7)]

Diagnostics

(Visit 4:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

(Visit 4:1) Informational (Form): Visit schedulable, but most scheduling windows are when JWST is pointed in direction of greatest micrometeoroid impact risk. This is likely due to scheduling special requirements.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(2)	IFU-A	RA: 17 30 41.7042 (262.6737675d) Dec: -21 29 43.51 (-21.49542d) Equinox: J2000		

Comments:
Category=ISM
Description=[Supernova remnants]
Extended=YES

Template

TA Method	HFF Readout Mode
NONE	false

Dithers

#	Dither Type	Size	Starting Point	Number of Points	Points
1	4-POINT-DITHER				

Spectral Elements

#	Grating/Filter	Readout Pattern	Groups/Int	Integrations/Exp	Leakcal	Dither	Autocal	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1	G395M/F290LP	NRSIRS2RAPID	10	1	false	true	NONE	4	4	641.911	
2	G395M/F290LP	NRSIRS2RAPID	10	1	true	true	NONE	4	4	641.911	

Special Requirements

4 After 3 by 60 Days to 210 Days
Sequence Observations 4, 5, 6, 7, Non-interruptible

Observation

Proposal 7075, Observation 5: NIRSpec IFU-B Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: NIRSpec IFU Spectroscopy

Background Observations:[NIRSpec IFU background (Obs 7)]

Diagnostics

(Visit 5:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(3)	IFU-B	RA: 17 30 36.3793 (262.6515804d) Dec: -21 28 33.02 (-21.47584d) Equinox: J2000		

Comments:
Category=ISM
Description=[Supernova remnants]
Extended=YES

Template

TA Method	HFF Readout Mode
NONE	false

Dithers

#	Dither Type	Size	Starting Point	Number of Points	Points
1	4-POINT-DITHER				

Spectral Elements

#	Grating/Filter	Readout Pattern	Groups/Int	Integrations/Exp	Leakcal	Dither	Autocal	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1	G395M/F290LP	NRSIRS2RAPID	10	1	false	true	NONE	4	4	641.911	
2	G395M/F290LP	NRSIRS2RAPID	10	1	true	true	NONE	4	4	641.911	

Special Requirements

Sequence Observations 4, 5, 6, 7, Non-interruptible

Observation

Proposal 7075, Observation 6: NIRSpec IFU-C Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: NIRSpec IFU Spectroscopy

Background Observations:[NIRSpec IFU background (Obs 7)]

Diagnostics

(Visit 6:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(4)	IFU-C	RA: 17 30 44.0285 (262.6834521d) Dec: -21 28 1.78 (-21.46716d) Equinox: J2000		

Comments:
Category=ISM
Description=[Supernova remnants]
Extended=YES

Template

TA Method	HFF Readout Mode
NONE	false

Dithers

#	Dither Type	Size	Starting Point	Number of Points	Points
1	4-POINT-DITHER				

Spectral Elements

#	Grating/Filter	Readout Pattern	Groups/Int	Integrations/Exp	Leakcal	Dither	Autocal	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1	G395M/F290LP	NRSIRS2RAPID	10	1	false	true	NONE	4	4	641.911	
2	G395M/F290LP	NRSIRS2RAPID	10	1	true	true	NONE	4	4	641.911	

Special Requirements

Sequence Observations 4, 5, 6, 7, Non-interruptible

Observation

Proposal 7075, Observation 7: NIRSpec IFU background Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: NIRSpec IFU Spectroscopy

Background Observation For: [NIRSpec IFU-A (Obs 4), NIRSpec IFU-B (Obs 5), NIRSpec IFU-C (Obs 6)]

Diagnostics

(Visit 7:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(5)	BACKGROUND	RA: 17 31 5.6000 (262.7733333d) Dec: -21 36 45.00 (-21.61250d) Equinox: J2000		

Comments:
Category=Calibration
Description=[Telescope/sky background]
Extended=YES

Template

TA Method	HFF Readout Mode
NONE	false

Dithers

#	Dither Type	Size	Starting Point	Number of Points	Points
1	4-POINT-DITHER				

Spectral Elements

#	Grating/Filter	Readout Pattern	Groups/Int	Integrations/Exp	Leakcal	Dither	Autocal	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1	G395M/F290LP	NRSIRS2RAPID	10	1	false	true	NONE	4	4	641.911	
2	G395M/F290LP	NRSIRS2RAPID	10	1	true	true	NONE	4	4	641.911	

Special Requirements

Sequence Observations 4, 5, 6, 7, Non-interruptible

Observation

Proposal 7075, Observation 8: MIRI IFU-A Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: MIRI Medium Resolution Spectroscopy

Background Observations:[MIRI IFU background (Obs 11)]

Diagnostics

(Visit 8:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(2)	IFU-A	RA: 17 30 41.7042 (262.6737675d) Dec: -21 29 43.51 (-21.49542d) Equinox: J2000		

Comments:
Category=ISM
Description=[Supernova remnants]
Extended=YES

Acquisition

#	Target
1	NONE

Template

AcqFilter	Primary Channel	Simultaneous Imaging	Imager Subarray	Grating Wheel Direction
	All MRS	YES	FULL	Allow Auto Reorder

Dithers

#	Dither Type	Optimized For	Direction
1	4-Point	EXTENDED SOURCE	NEGATIVE

Spectral Elements

#	Wavelength Range	Detector	Filter	Readout Pattern	Groups/Int	Integrations/Exp	Exposures/Dith	Dither	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1		IMAGER	F560W	FASTR1	15	1	1	Dither 1	4	4	166.502	
1	SHORT(A)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
1	SHORT(A)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	
2		IMAGER	F1000W	FASTR1	15	1	1	Dither 1	4	4	166.502	
2	MEDIUM(B)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
2	MEDIUM(B)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	
3		IMAGER	F1130W	FASTR1	15	1	1	Dither 1	4	4	166.502	
3	LONG(C)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
3	LONG(C)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	

Special Requirements	
	8 After 2 by 60 Days to 210 Days Sequence Observations 8, 9, 10, 11, Non-interruptible

Observation

Proposal 7075, Observation 9: MIRI IFU-B Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: MIRI Medium Resolution Spectroscopy

Background Observations:[MIRI IFU background (Obs 11)]

Diagnostics

(Visit 9:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(3)	IFU-B	RA: 17 30 36.3793 (262.6515804d) Dec: -21 28 33.02 (-21.47584d) Equinox: J2000		

Comments:
Category=ISM
Description=[Supernova remnants]
Extended=YES

Acquisition

#	Target
1	NONE

Template

AcqFilter	Primary Channel	Simultaneous Imaging	Imager Subarray	Grating Wheel Direction
	All MRS	YES	FULL	Allow Auto Reorder

Dithers

#	Dither Type	Optimized For	Direction
1	4-Point	EXTENDED SOURCE	NEGATIVE

Spectral Elements

#	Wavelength Range	Detector	Filter	Readout Pattern	Groups/Int	Integrations/Exp	Exposures/Dith	Dither	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1		IMAGER	F560W	FASTR1	15	1	1	Dither 1	4	4	166.502	
1	SHORT(A)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
1	SHORT(A)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	
2		IMAGER	F1000W	FASTR1	15	1	1	Dither 1	4	4	166.502	
2	MEDIUM(B)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
2	MEDIUM(B)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	
3		IMAGER	F1130W	FASTR1	15	1	1	Dither 1	4	4	166.502	
3	LONG(C)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
3	LONG(C)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	

Special Requirements	Sequence Observations 8, 9, 10, 11, Non-interruptible

Observation

Proposal 7075, Observation 10: MIRI IFU-C Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: MIRI Medium Resolution Spectroscopy

Background Observations:[MIRI IFU background (Obs 11)]

Diagnostics

(Visit 10:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(4)	IFU-C	RA: 17 30 44.0285 (262.6834521d) Dec: -21 28 1.78 (-21.46716d) Equinox: J2000		

Comments:
Category=ISM
Description=[Supernova remnants]
Extended=YES

Acquisition

#	Target
1	NONE

Template

AcqFilter	Primary Channel	Simultaneous Imaging	Imager Subarray	Grating Wheel Direction
	All MRS	YES	FULL	Allow Auto Reorder

Dithers

#	Dither Type	Optimized For	Direction
1	4-Point	EXTENDED SOURCE	NEGATIVE

Spectral Elements

#	Wavelength Range	Detector	Filter	Readout Pattern	Groups/Int	Integrations/Exp	Exposures/Dith	Dither	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1		IMAGER	F560W	FASTR1	15	1	1	Dither 1	4	4	166.502	
1	SHORT(A)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
1	SHORT(A)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	
2		IMAGER	F1000W	FASTR1	15	1	1	Dither 1	4	4	166.502	
2	MEDIUM(B)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
2	MEDIUM(B)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	
3		IMAGER	F1130W	FASTR1	15	1	1	Dither 1	4	4	166.502	
3	LONG(C)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
3	LONG(C)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	

Special Requirements	Sequence Observations 8, 9, 10, 11, Non-interruptible

Observation

Proposal 7075, Observation 11: MIRI IFU background Fri Jan 16 22:00:15 GMT 2026

Diagnostic Status: Warning

Observing Template: MIRI Medium Resolution Spectroscopy

Background Observation For: [MIRI IFU-A (Obs 8), MIRI IFU-B (Obs 9), MIRI IFU-C (Obs 10)]

Diagnostics

(Visit 11:1) Warning (Form): Overheads are provisional until the Visit Planner has been run.

Fixed Targets

#	Name	Target Coordinates	Targ. Coord. Corrections	Miscellaneous
(5)	BACKGROUND	RA: 17 31 5.6000 (262.7733333d) Dec: -21 36 45.00 (-21.61250d) Equinox: J2000		

Comments:
Category=Calibration
Description=[Telescope/sky background]
Extended=YES

Acquisition

#	Target
1	NONE

Template

AcqFilter	Primary Channel	Simultaneous Imaging	Imager Subarray	Grating Wheel Direction
	All MRS	YES	FULL	Allow Auto Reorder

Dithers

#	Dither Type	Optimized For	Direction
1	4-Point	EXTENDED SOURCE	NEGATIVE

Spectral Elements

#	Wavelength Range	Detector	Filter	Readout Pattern	Groups/Int	Integrations/Exp	Exposures/Dith	Dither	Total Dithers	Total Integrations	Total Exposure Time	Optional ETC ID
1		IMAGER	F560W	FASTR1	15	1	1	Dither 1	4	4	166.502	
1	SHORT(A)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
1	SHORT(A)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	
2		IMAGER	F1000W	FASTR1	15	1	1	Dither 1	4	4	166.502	
2	MEDIUM(B)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
2	MEDIUM(B)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	
3		IMAGER	F1130W	FASTR1	15	1	1	Dither 1	4	4	166.502	
3	LONG(C)	MRSLONG		FASTR1	50	1	1	Dither 1	4	4	555.008	
3	LONG(C)	MRSSHORT		FASTR1	50	1	1	Dither 1	4	4	555.008	

Special Requirements	Sequence Observations 8, 9, 10, 11, Non-interruptible