The ALMA Science Archive

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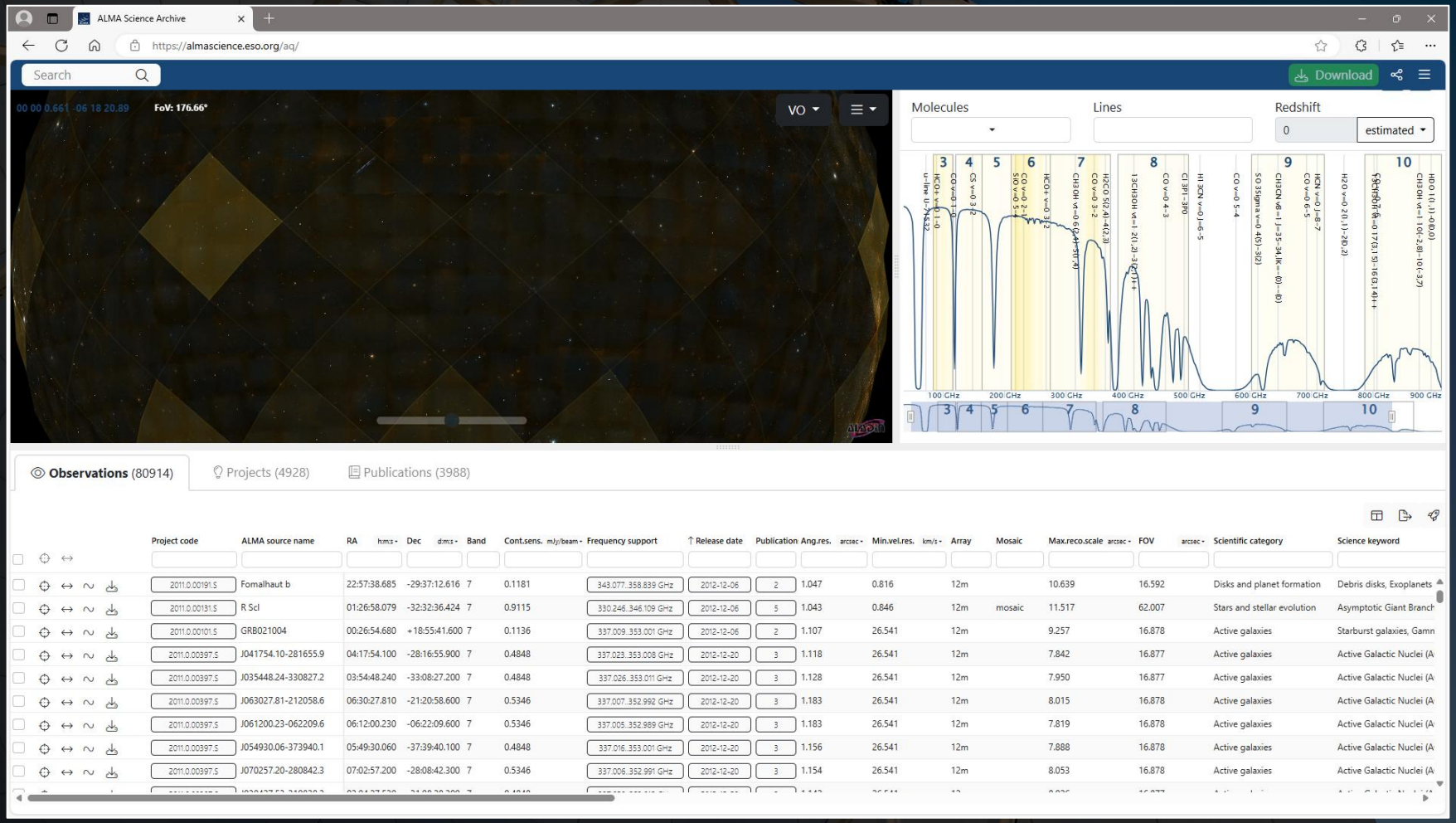
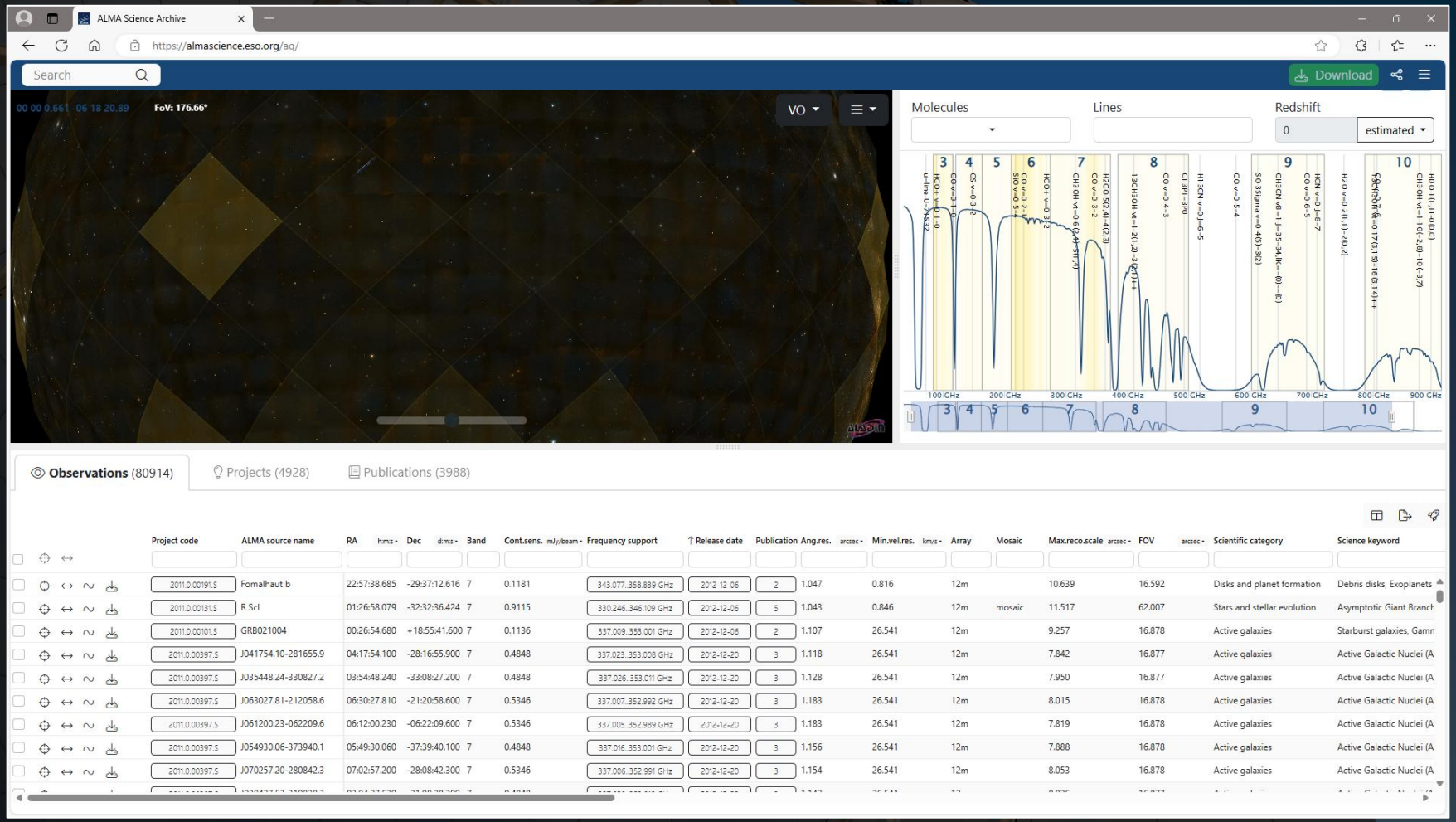
The ALMA Science Archive is located at https://almascience.eso.org/aq/ .
The default view shows the entire contents of the archive.



Project code	ALMA source name	RA	Dec	Band	Cont.sens.	Frequency support	Release date	Publication	Ang.res.	Min.vel.res.	Array	Mosaic	Max.reco.scale	FOV	Scientific category	Science keyword
2011.0.00191.S	Fomalhaut b	22:57:38.685	-29:37:12.616	7	0.1181	343.077..358.839 GHz	2012-12-06	2	1.047	0.816	12m		10.639	16.592	Disks and planet formation	Debris disks, Exoplanets
2011.0.00131.S	R Scl	01:26:58.079	-32:32:36.424	7	0.9115	330.246..346.109 GHz	2012-12-06	5	1.043	0.846	12m	mosaic	11.517	62.007	Stars and stellar evolution	Asymptotic Giant Branch
2011.0.00101.S	GRB021004	00:26:54.680	+18:55:41.600	7	0.1136	337.009..353.001 GHz	2012-12-06	2	1.107	26.541	12m		9.257	16.878	Active galaxies	Starburst galaxies, Gamn
2011.0.00397.S	J041754.10-281655.9	04:17:54.100	-28:16:55.900	7	0.4848	337.023..353.008 GHz	2012-12-20	3	1.118	26.541	12m		7.842	16.877	Active galaxies	Active Galactic Nuclei (A
2011.0.00397.S	J035448.24-330827.2	03:54:48.240	-33:08:27.200	7	0.4848	337.026..353.011 GHz	2012-12-20	3	1.128	26.541	12m		7.950	16.877	Active galaxies	Active Galactic Nuclei (A
2011.0.00397.S	J063027.81-212058.6	06:30:27.810	-21:20:58.600	7	0.5346	337.007..352.992 GHz	2012-12-20	3	1.183	26.541	12m		8.015	16.878	Active galaxies	Active Galactic Nuclei (A
2011.0.00397.S	J061200.23-062209.6	06:12:00.230	-06:22:09.600	7	0.5346	337.005..352.989 GHz	2012-12-20	3	1.183	26.541	12m		7.819	16.878	Active galaxies	Active Galactic Nuclei (A
2011.0.00397.S	J054930.06-373940.1	05:49:30.060	-37:39:40.100	7	0.4848	337.016..353.001 GHz	2012-12-20	3	1.156	26.541	12m		7.888	16.878	Active galaxies	Active Galactic Nuclei (A
2011.0.00397.S	J070257.20-280842.3	07:02:57.200	-28:08:42.300	7	0.5346	337.006..352.991 GHz	2012-12-20	3	1.154	26.541	12m		8.053	16.878	Active galaxies	Active Galactic Nuclei (A

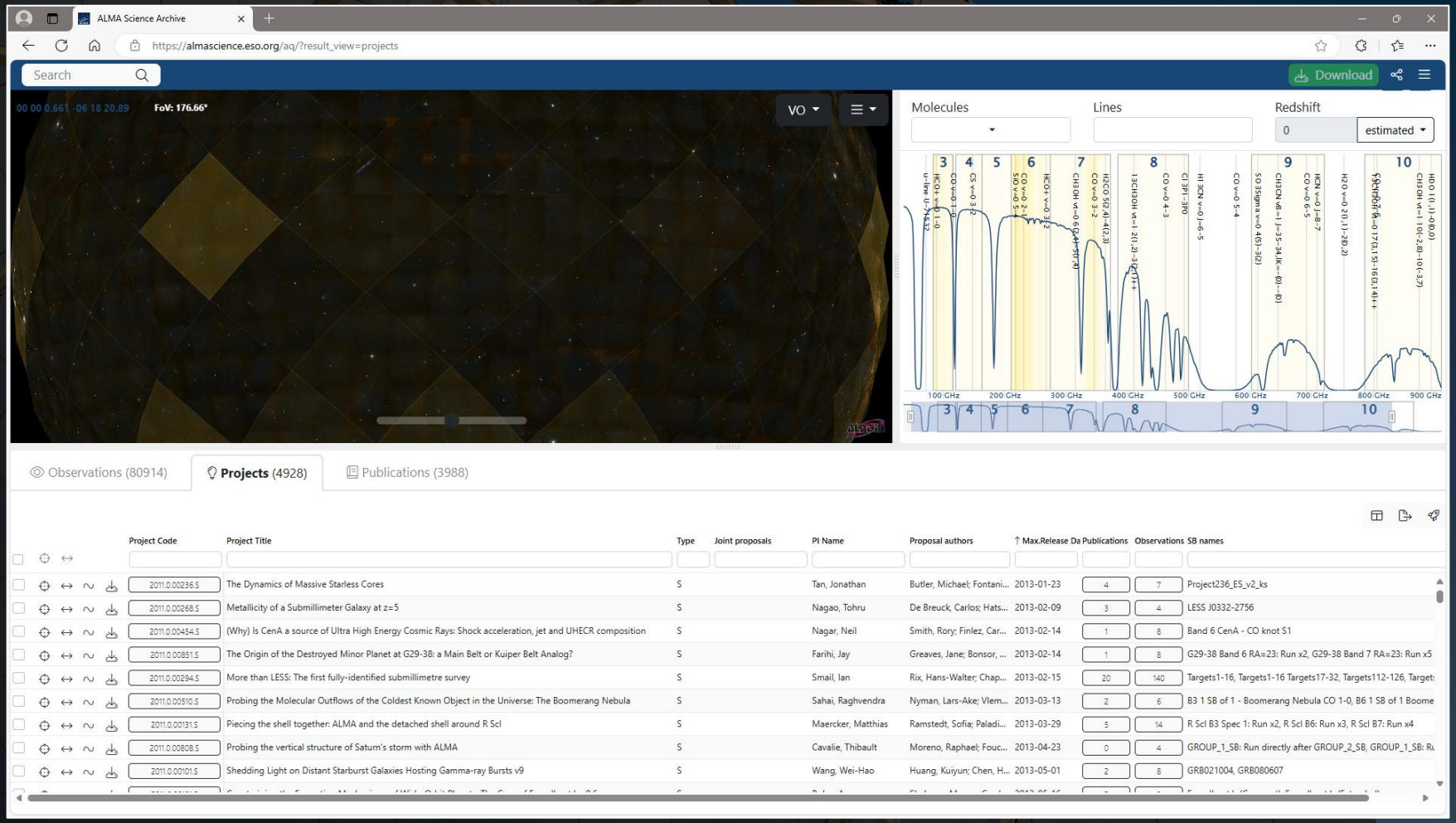
The interface has three sections:

- The sky viewer
- The spectral viewer
- The results table



The results table actually has three tabs:

- Observation
- Project
- Publication



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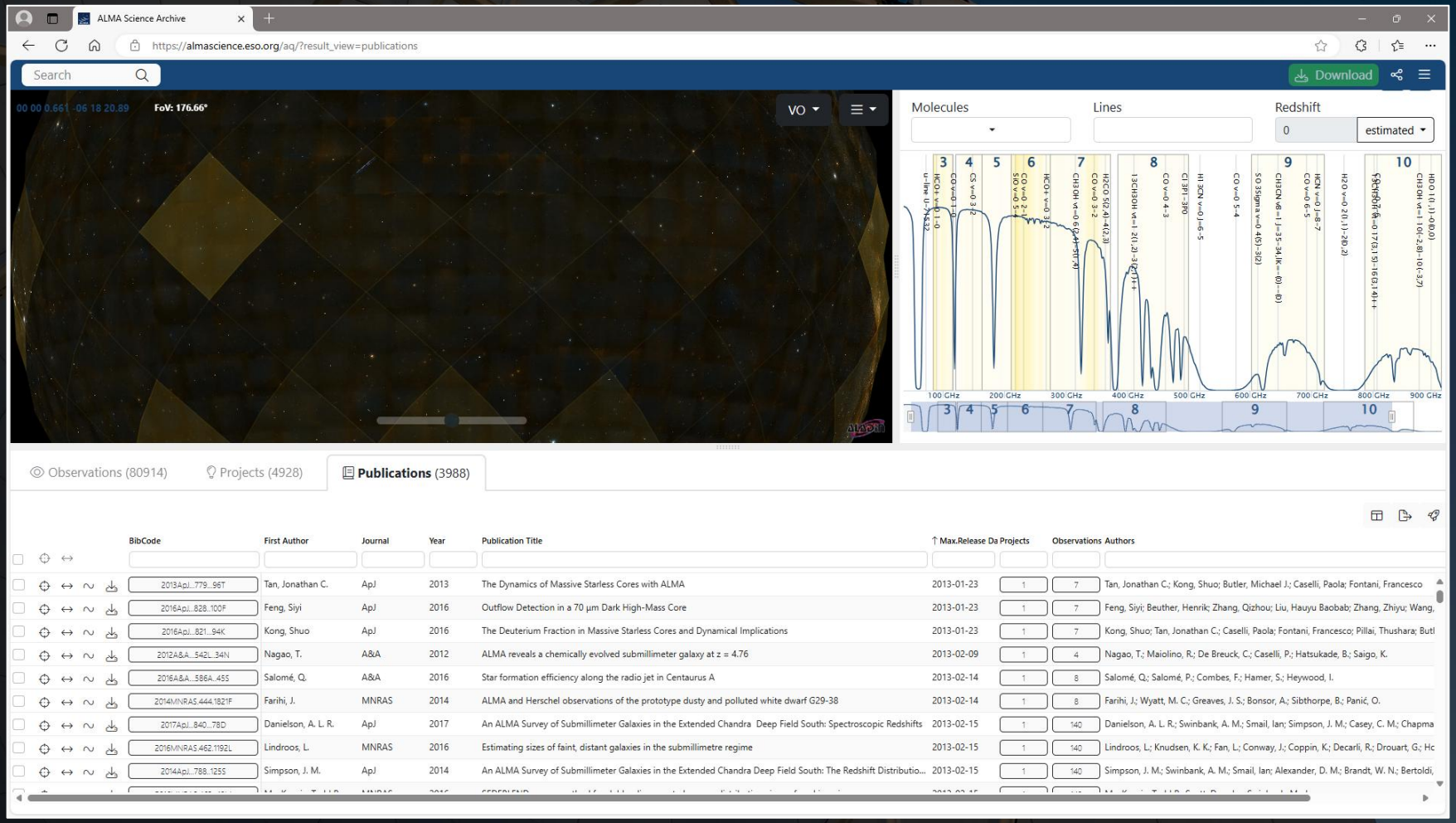
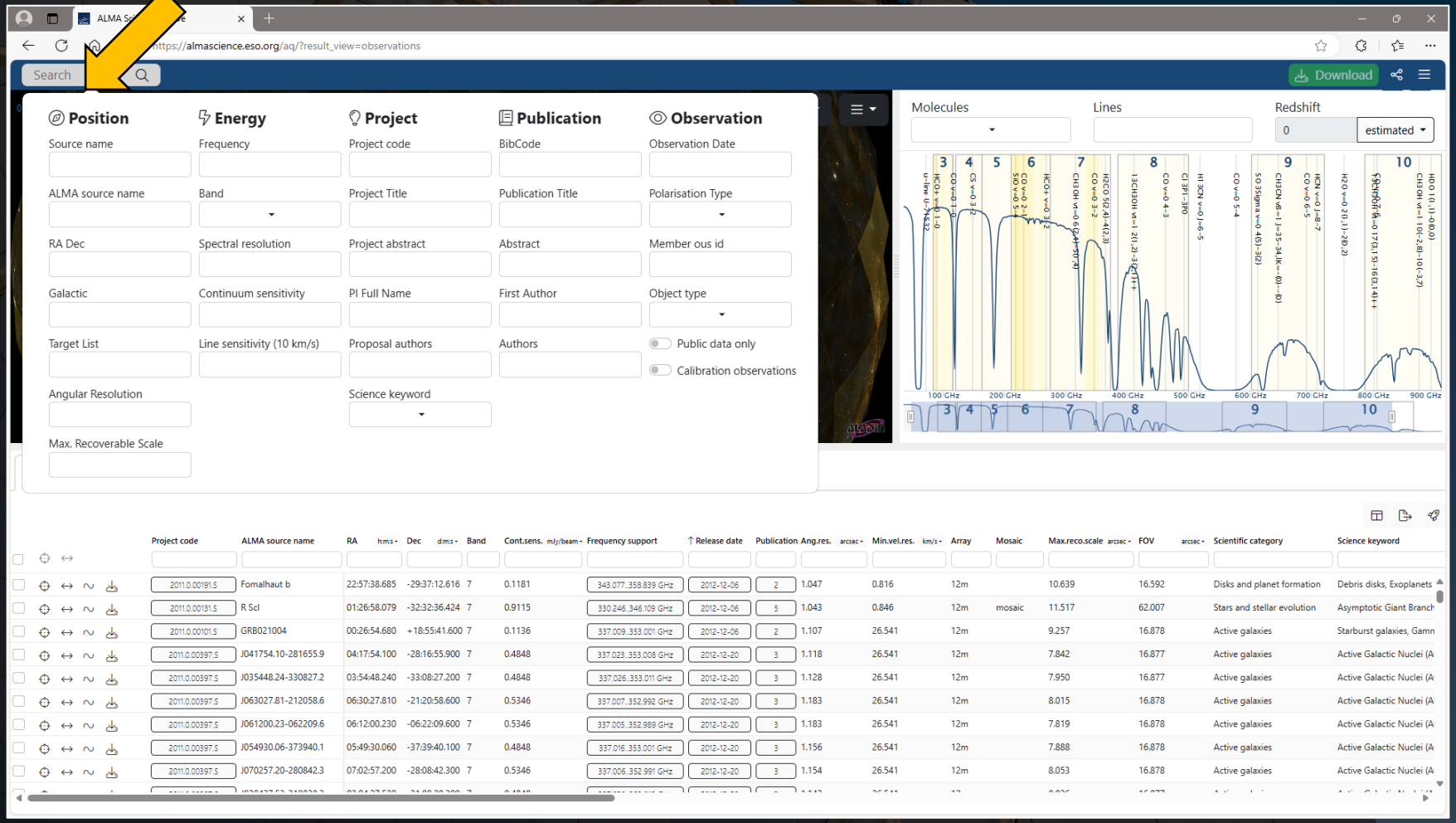
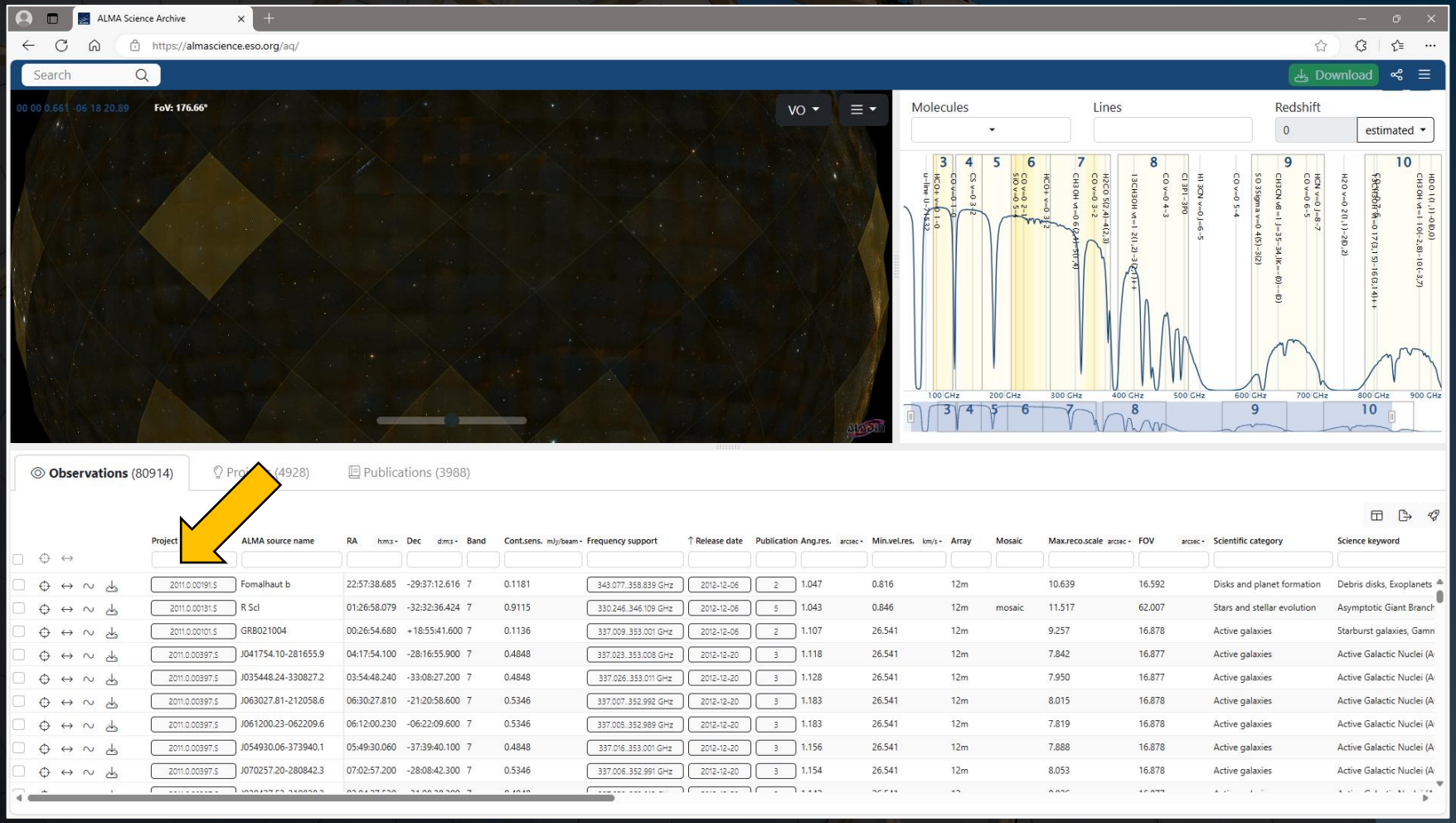


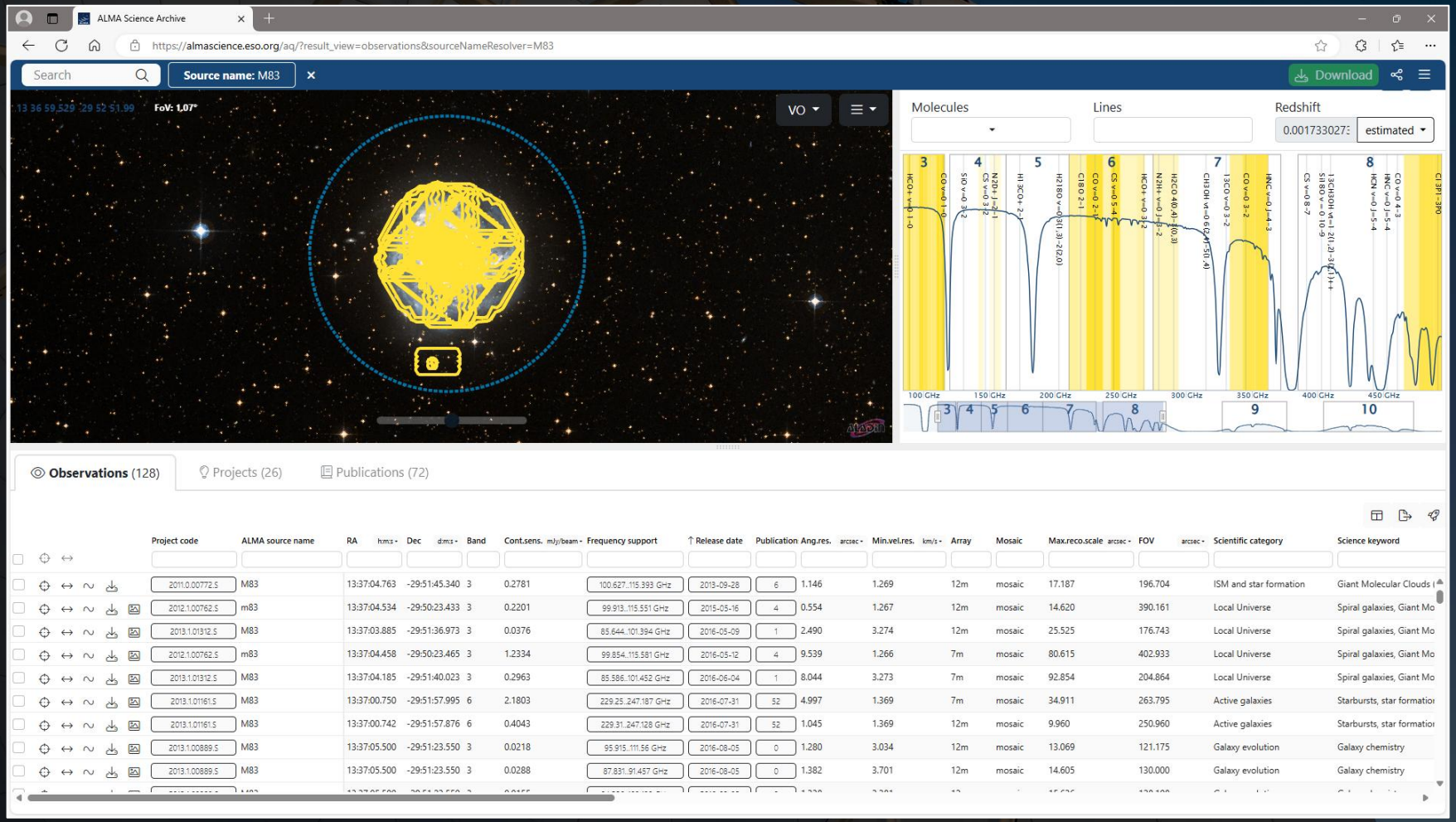
Searches can be done in one of two ways. The best way to start a search, especially for a single object, is to use the search menu that is displayed when hovering over the rectangle with the magnifying glass.



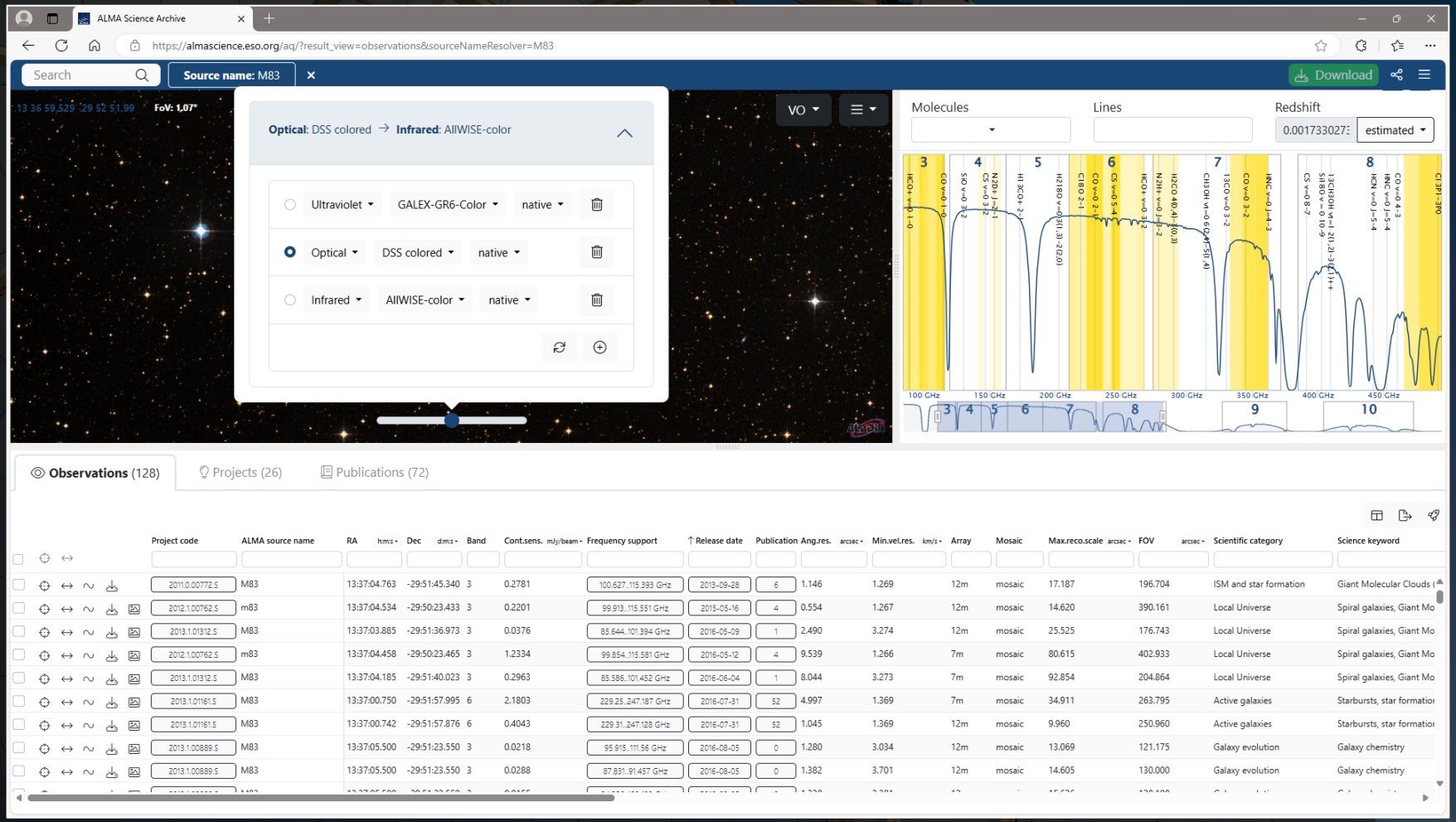
The other method is to type in search criteria in the entry fields above each column in the results table. This can also be done after initially setting up a search using the search menu.



When the number of results in the results table changes, the map and spectrum panels will automatically adjust to show the observed fields and spectra in more detail.



The map display can be adjusted to display different wavebands. The spectrum can be adjusted to show broader or narrower frequency ranges, to show different spectral lines, and to show those lines at different redshifts.



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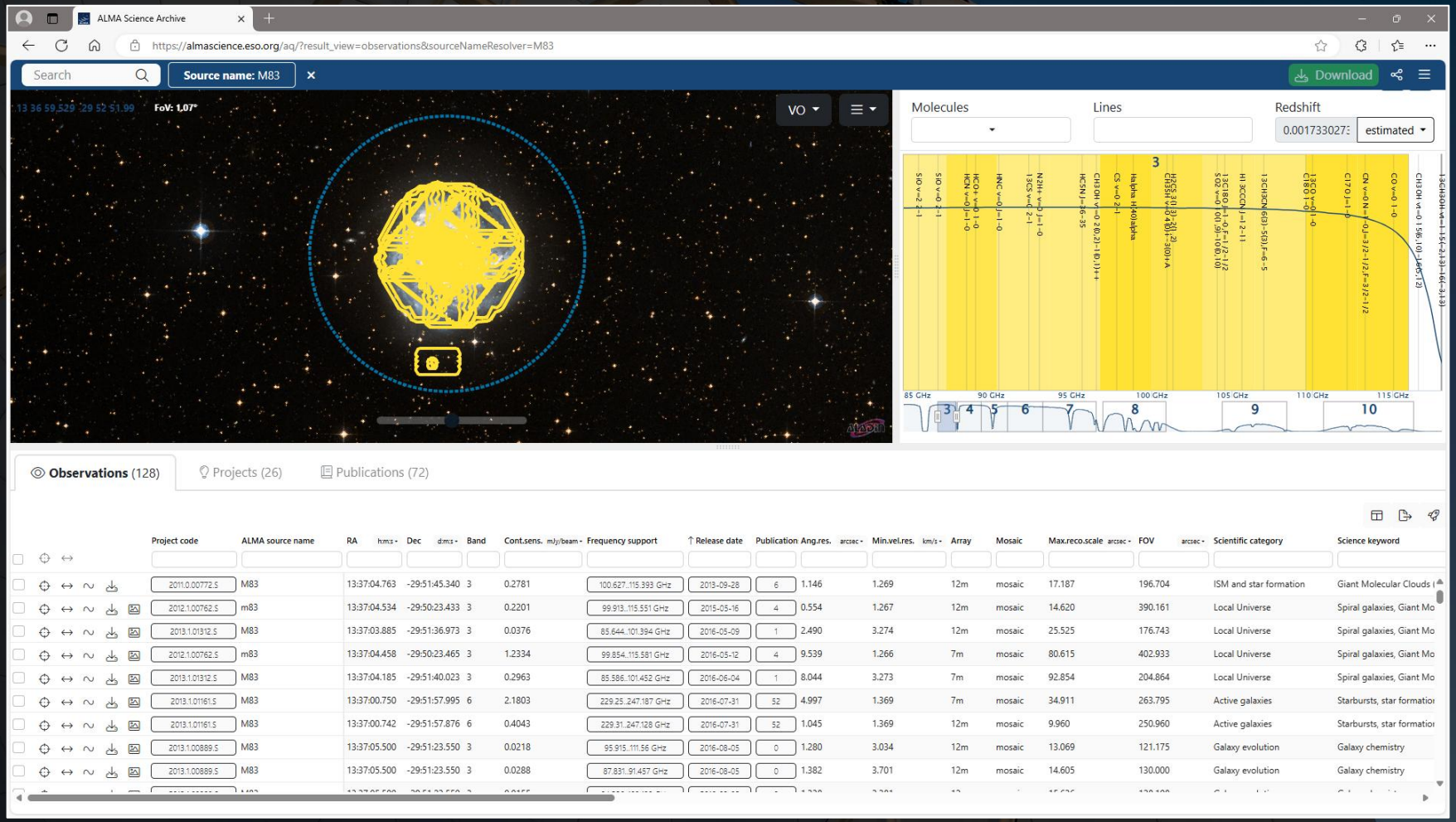
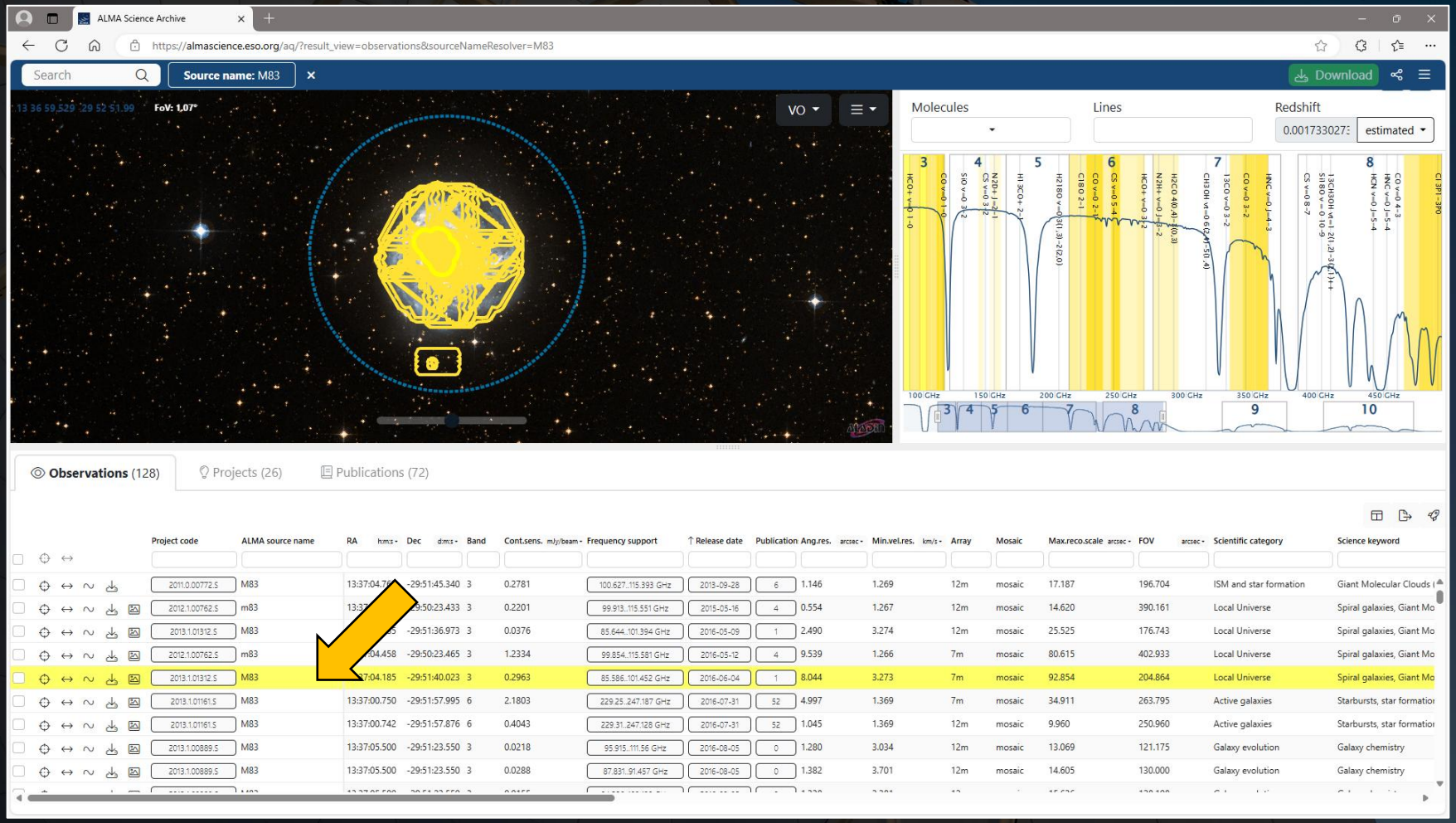
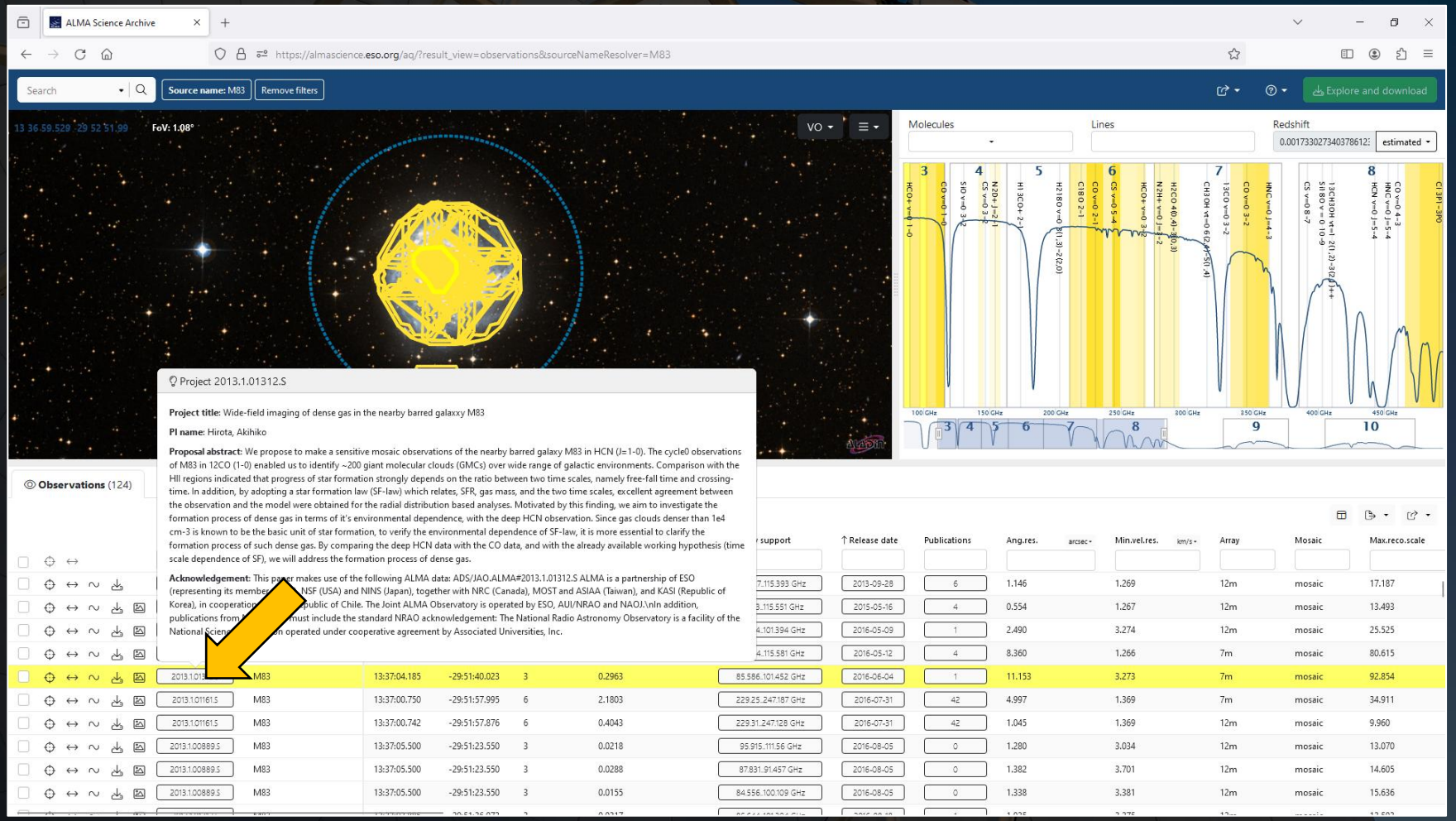


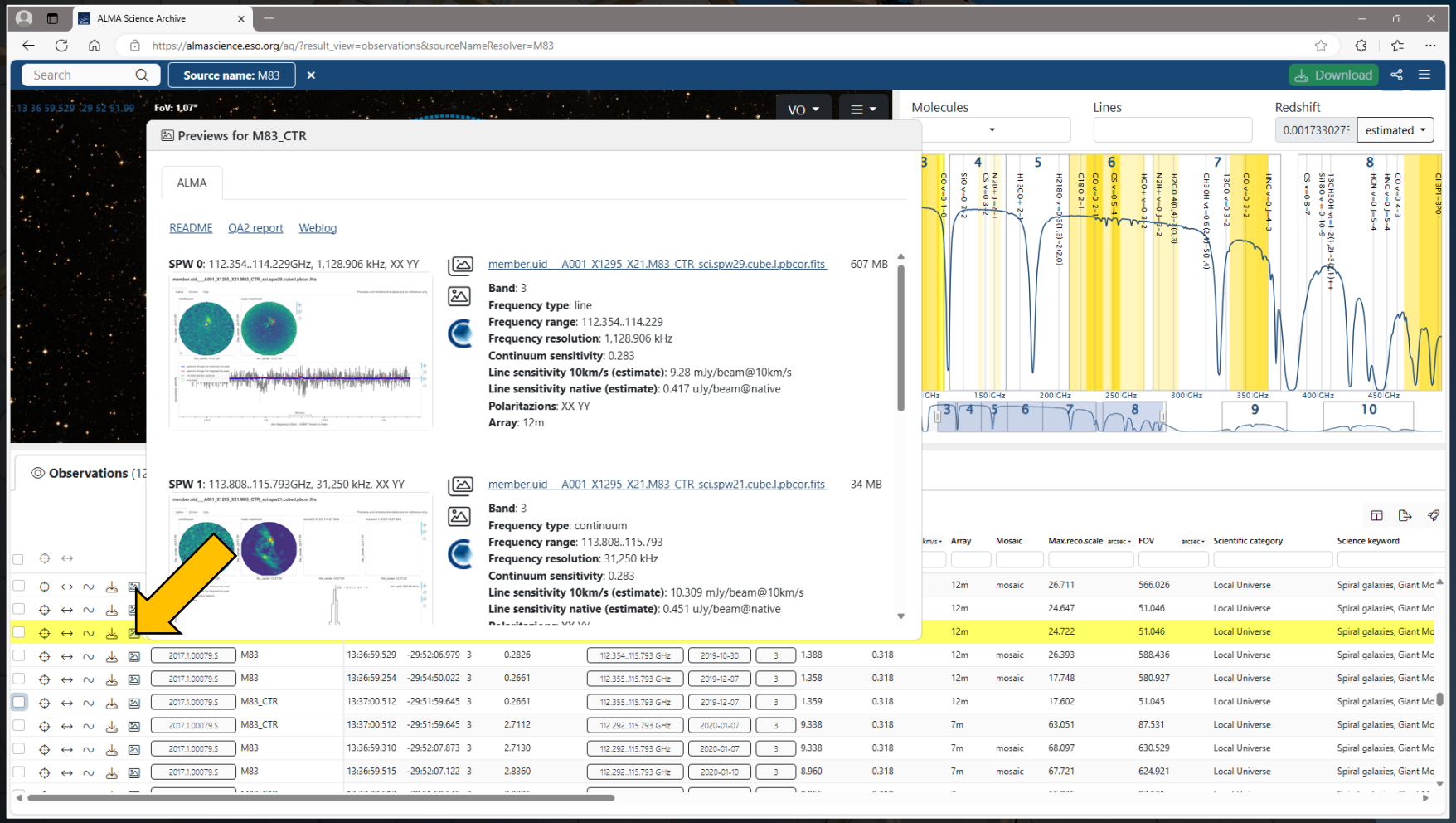
Hovering over an entry in the results table will highlight the row, the field in the map panel, and the frequency ranges in the spectrum panel.



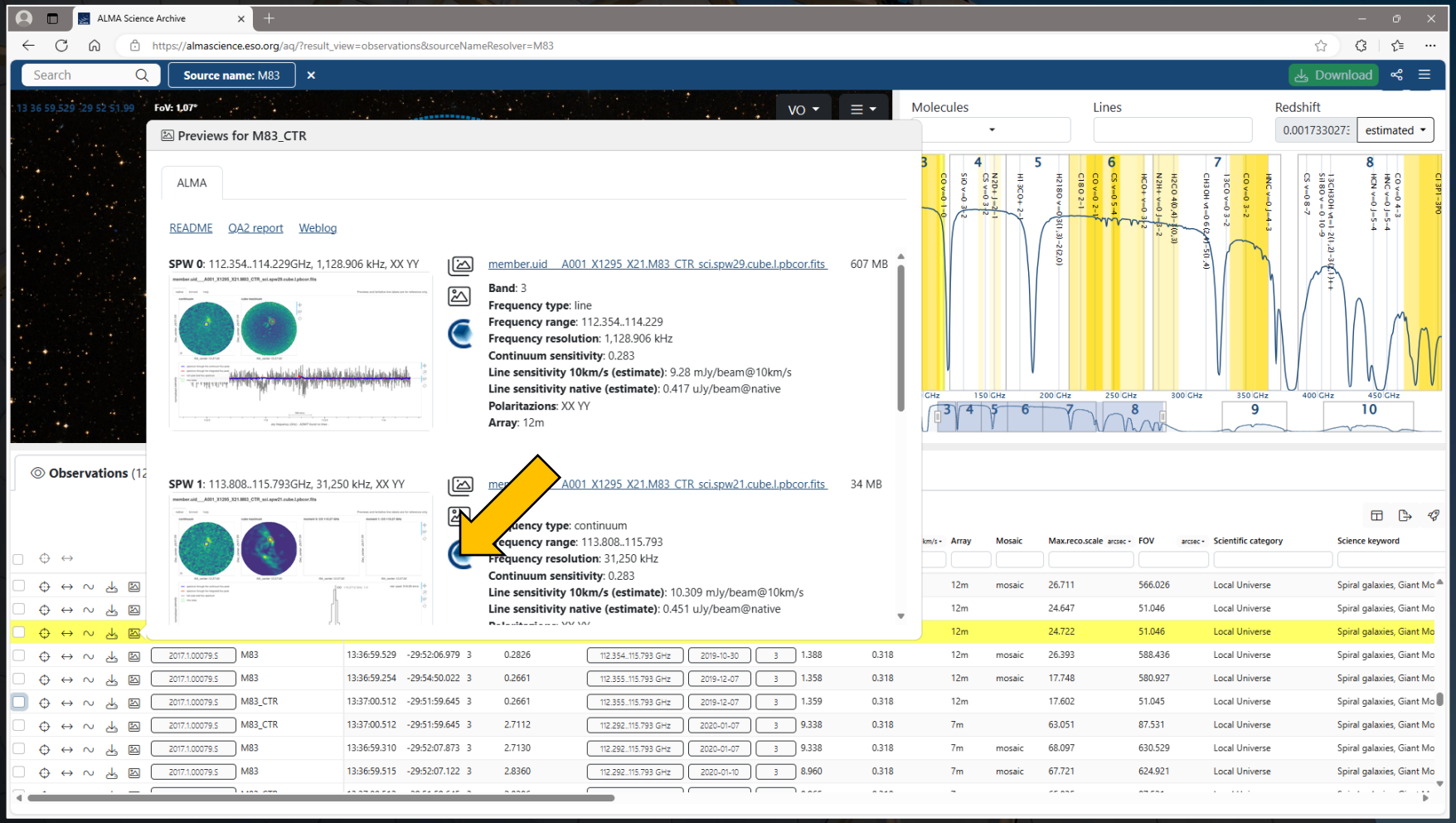
Hovering the cursor over items in boxes will reveal a pop-up window with extra information.



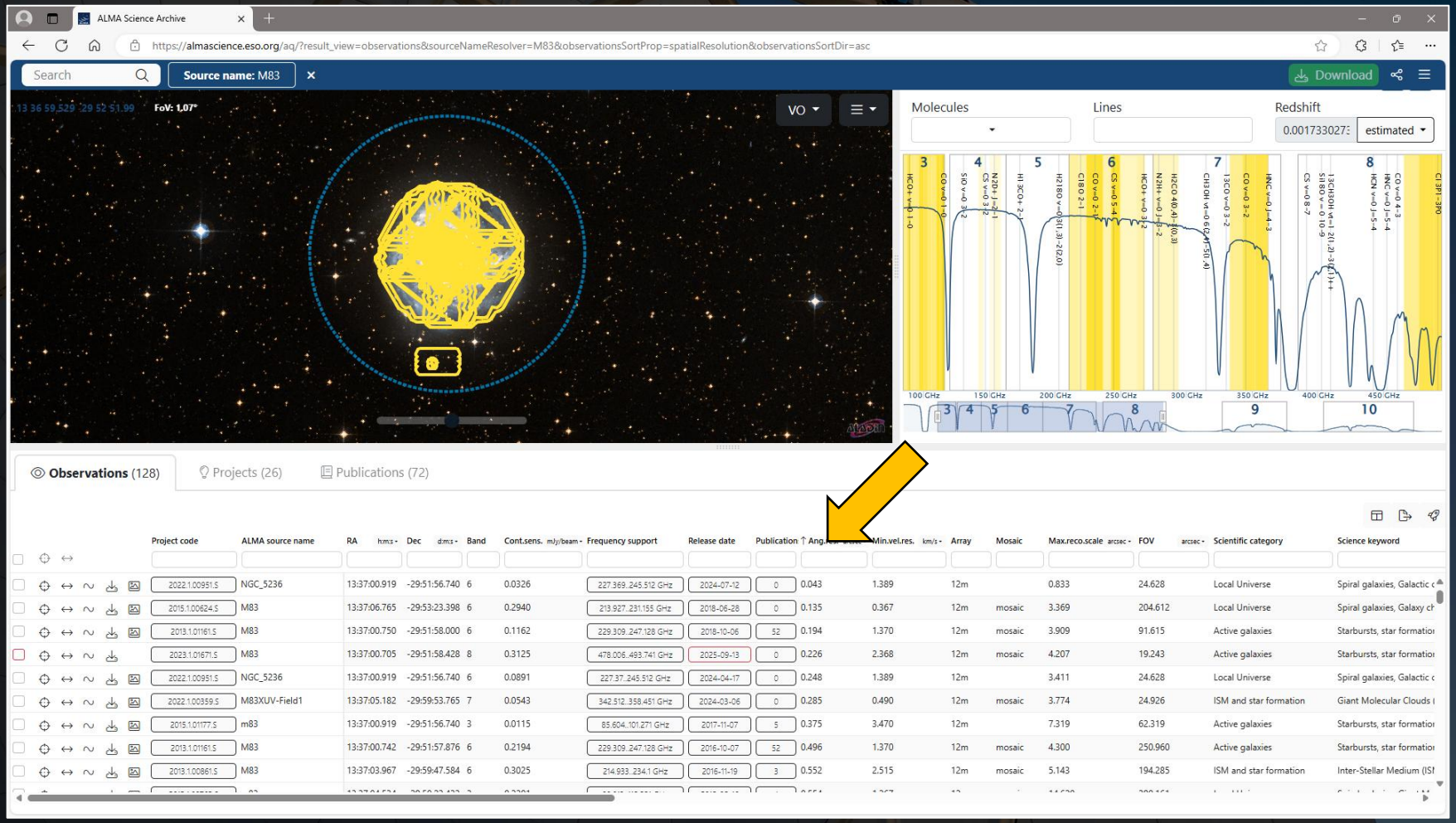
Additionally, hovering over the box with the squares inside it on the left will reveal preview images, links to those images, and links to quality assurance information.



Clicking on the C symbol will launch CARTA, which can be used to inspect the data in more detail and even make measurements.



The results from a search can be sorted by any column. The results can also be further filtered.



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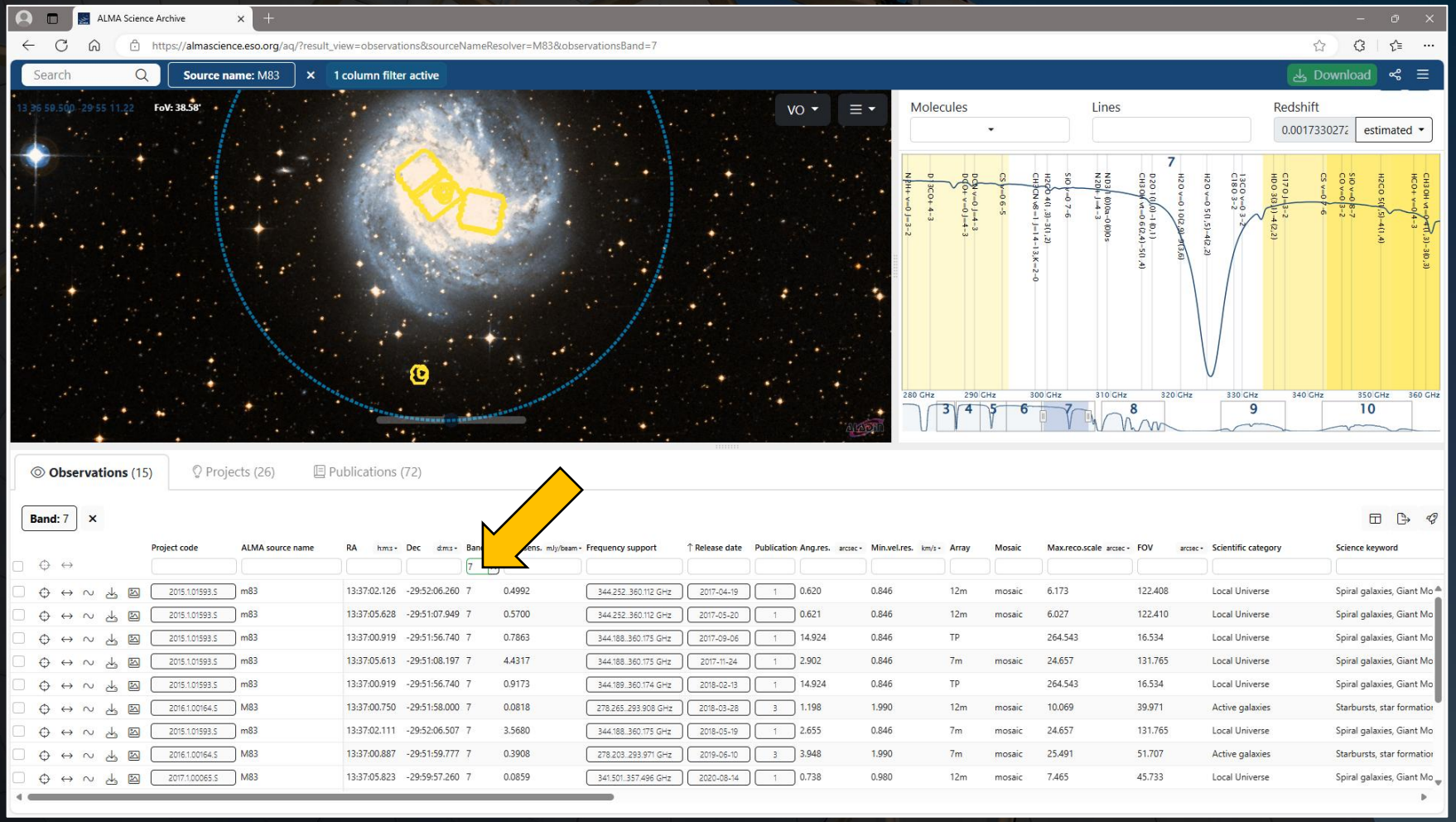
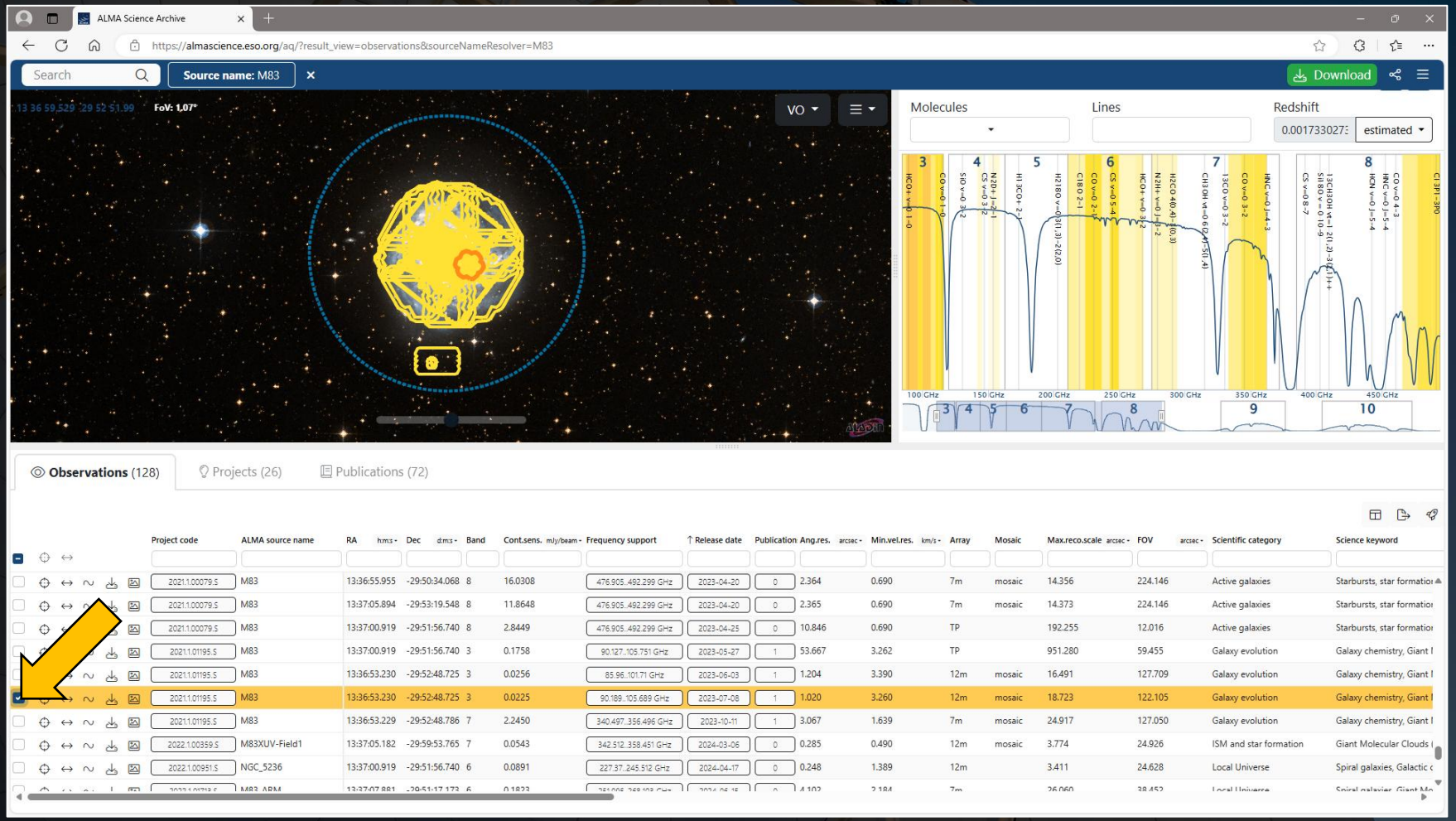
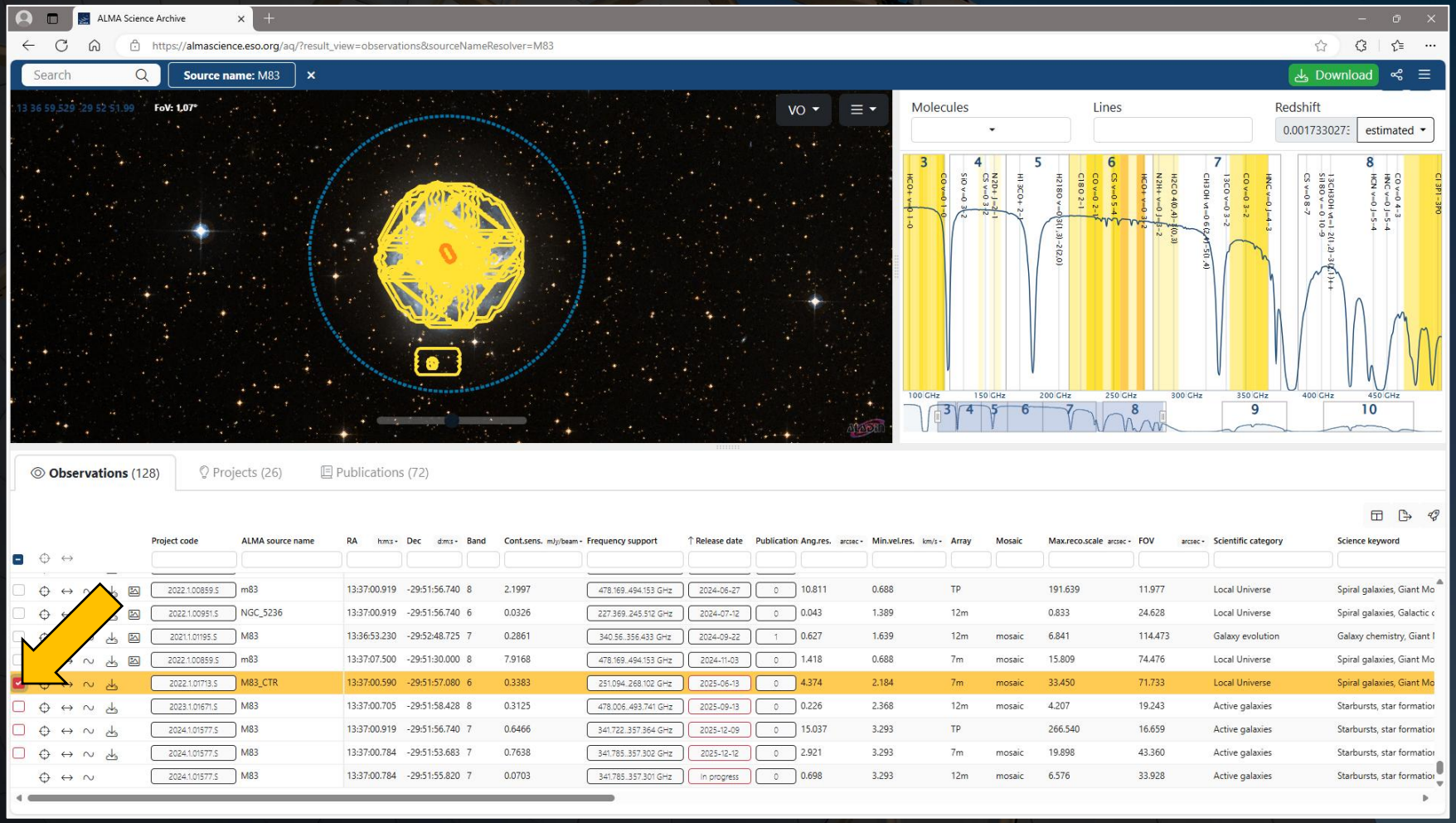


Project code	ALMA source name	RA	Dec	Band	Frequency support	Release date	Publication	Ang.res.	Min.vel.res.	Array	Mosaic	Max.reco.scale	FOV	Scientific category	Science keyword
2015.1.01593.S	m83	13:37:02.126	-29:52:06.260	7	344.252..360.112 GHz	2017-04-19	1	0.620	0.846	12m	mosaic	6.173	122.408	Local Universe	Spiral galaxies, Giant Mo
2015.1.01593.S	m83	13:37:05.628	-29:51:07.949	7	344.252..360.112 GHz	2017-05-20	1	0.621	0.846	12m	mosaic	6.027	122.410	Local Universe	Spiral galaxies, Giant Mo
2015.1.01593.S	m83	13:37:00.919	-29:51:56.740	7	344.188..360.175 GHz	2017-09-06	1	14.924	0.846	TP		264.543	16.534	Local Universe	Spiral galaxies, Giant Mo
2015.1.01593.S	m83	13:37:05.613	-29:51:08.197	7	344.188..360.175 GHz	2017-11-24	1	2.902	0.846	7m	mosaic	24.657	131.765	Local Universe	Spiral galaxies, Giant Mo
2015.1.01593.S	m83	13:37:00.919	-29:51:56.740	7	344.189..360.174 GHz	2018-02-13	1	14.924	0.846	TP		264.543	16.534	Local Universe	Spiral galaxies, Giant Mo
2016.1.00164.S	M83	13:37:00.750	-29:51:58.000	7	278.265..293.908 GHz	2018-03-28	3	1.198	1.990	12m	mosaic	10.069	39.971	Active galaxies	Starbursts, star formatio
2015.1.01593.S	m83	13:37:02.111	-29:52:06.507	7	344.188..360.175 GHz	2018-05-19	1	2.655	0.846	7m	mosaic	24.657	131.765	Local Universe	Spiral galaxies, Giant Mo
2016.1.00164.S	M83	13:37:00.887	-29:51:59.777	7	278.203..293.971 GHz	2019-06-10	3	3.948	1.990	7m	mosaic	25.491	51.707	Active galaxies	Starbursts, star formatio
2017.1.00065.S	M83	13:37:05.823	-29:59:57.260	7	341.501..357.496 GHz	2020-08-14	1	0.738	0.980	12m	mosaic	7.465	45.733	Local Universe	Spiral galaxies, Giant Mo

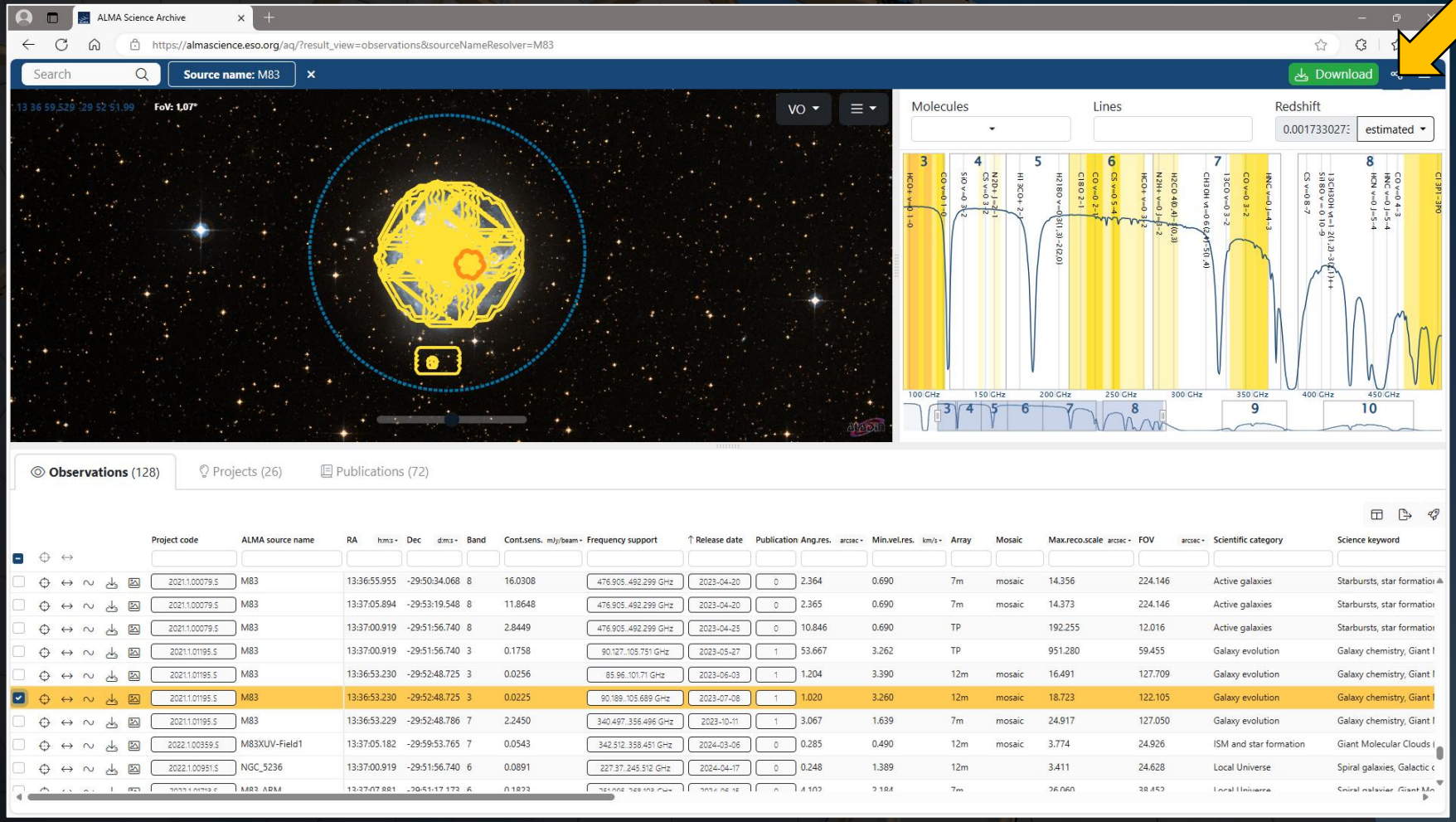
Clicking on the checkbox next to an observation will select the data for download. The row will change to orange as will the field in the map panel and the frequency range in the spectral plot.



Proprietary data can be selected but cannot be downloaded. The checkbox will appear red when these data are selected. Other data (such as for programs where the observations are not yet complete or where the data are in QA3) cannot be selected.



The interface has several other options as well. These include copying the link to the search results, selecting the columns that are displayed and saving the search results.



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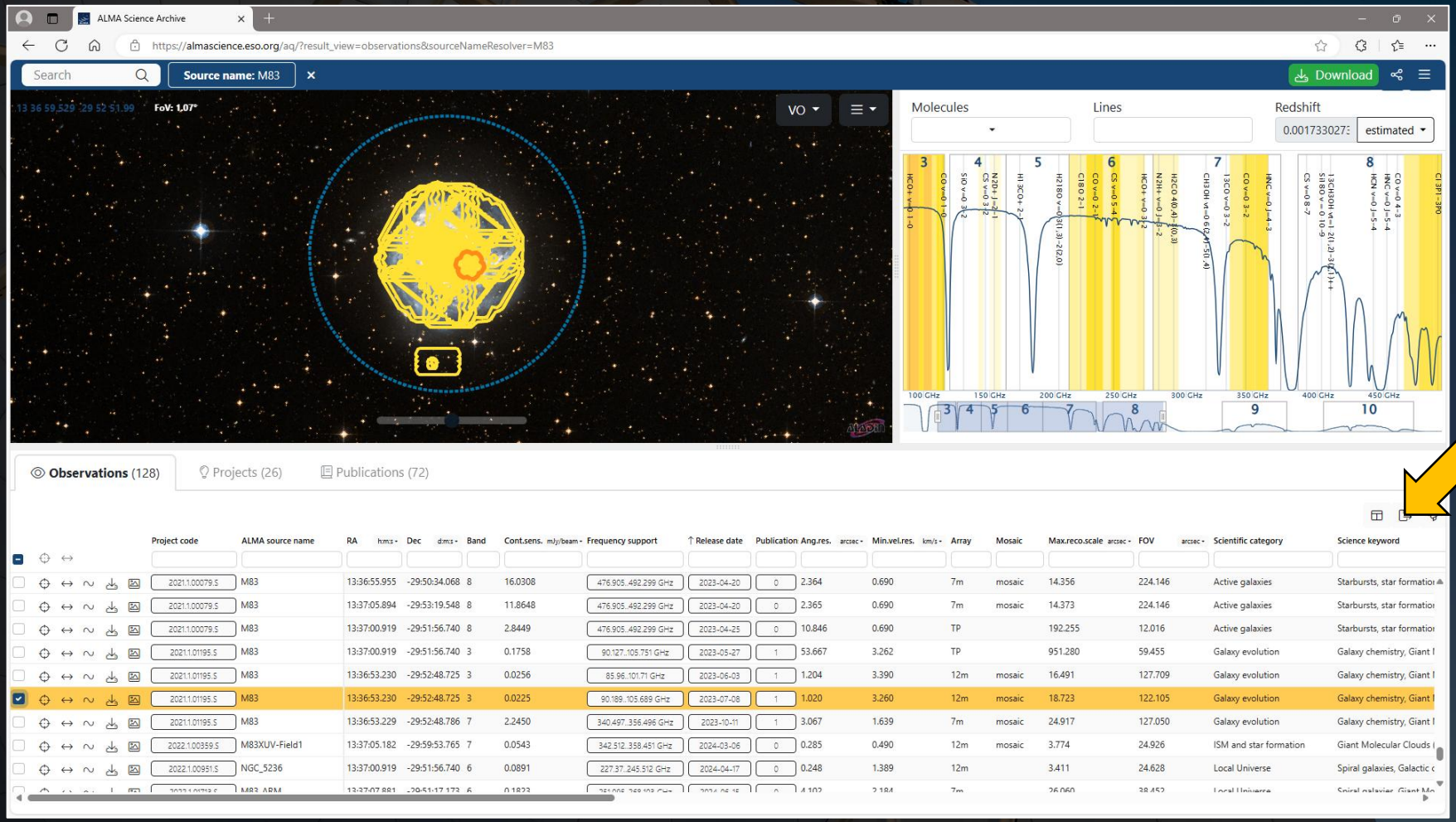
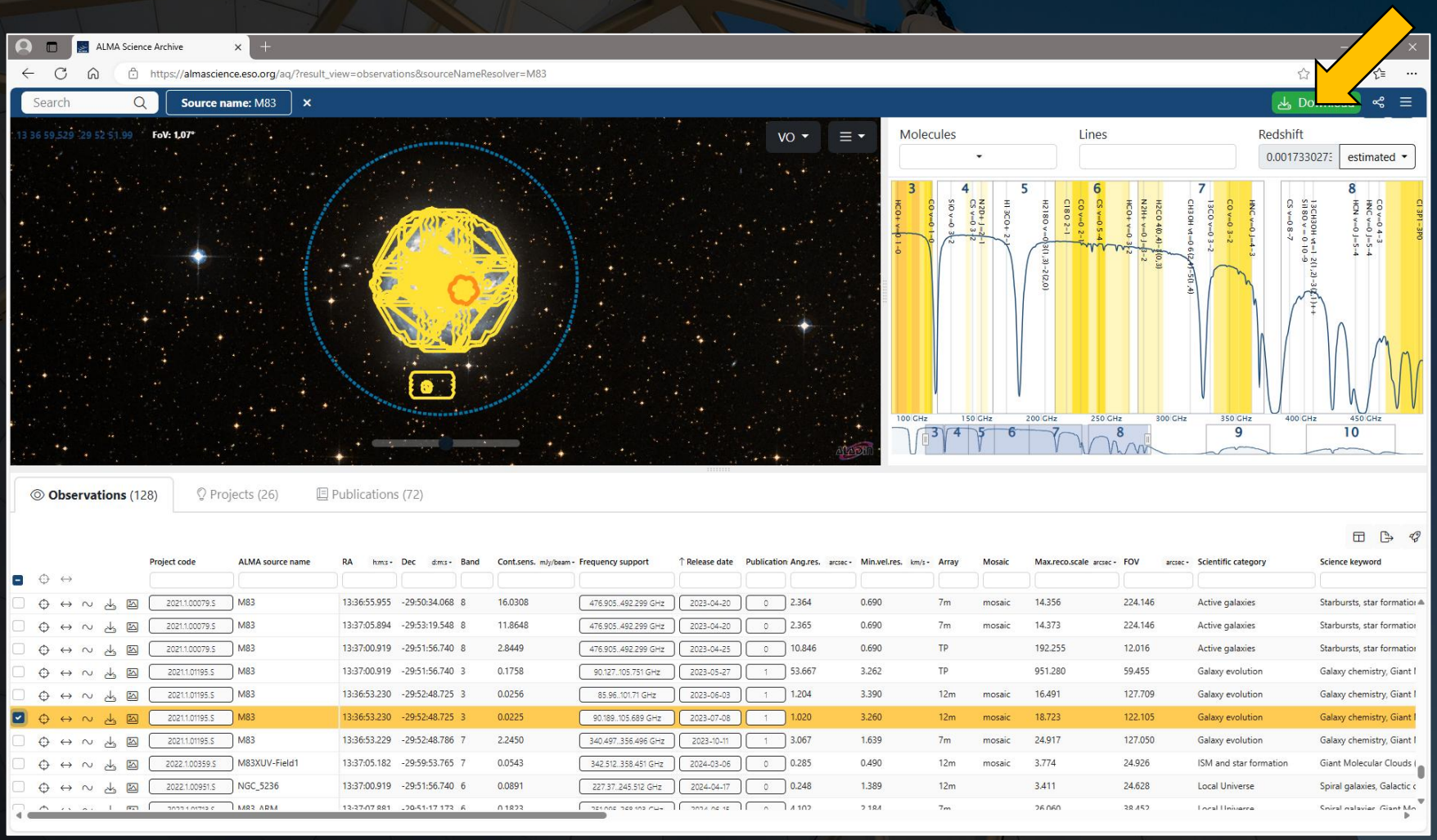
2021.1.00079.S	M83	13:36:55.955	-29:50:34.068	8	16.0308	476.905..492.299 GHz	2023-04-20	0	2.364	0.690	7m	mosaic	14.356	224.146	Active galaxies	Starbursts, star formatio
2021.1.00079.S	M83	13:37:05.894	-29:53:19.548	8	11.8648	476.905..492.299 GHz	2023-04-20	0	2.365	0.690	7m	mosaic	14.373	224.146	Active galaxies	Starbursts, star formatio
2021.1.00079.S	M83	13:37:00.919	-29:51:56.740	8	2.8449	476.905..492.299 GHz	2023-04-25	0	10.846	0.690	TP		192.255	12.016	Active galaxies	Starbursts, star formatio
2021.1.01195.S	M83	13:37:00.919	-29:51:56.740	3	0.1758	90.127..105.751 GHz	2023-05-27	1	53.667	3.262	TP		951.280	59.455	Galaxy evolution	Galaxy chemistry, Giant I
2021.1.01195.S	M83	13:36:53.230	-29:52:48.725	3	0.0256	85.96..101.71 GHz	2023-06-03	1	1.204	3.390	12m	mosaic	16.491	127.709	Galaxy evolution	Galaxy chemistry, Giant I
2021.1.01195.S	M83	13:36:53.230	-29:52:48.725	3	0.0225	90.189..105.689 GHz	2023-07-08	1	1.020	3.260	12m	mosaic	18.723	122.105	Galaxy evolution	Galaxy chemistry, Giant I
2021.1.01195.S	M83	13:36:53.229	-29:52:48.786	7	2.2450	340.497..356.496 GHz	2023-10-11	1	3.067	1.639	7m	mosaic	24.917	127.050	Galaxy evolution	Galaxy chemistry, Giant I
2022.1.00359.S	M83XUV-Field1	13:37:05.182	-29:59:53.765	7	0.0543	342.512..358.451 GHz	2024-03-06	0	0.285	0.490	12m	mosaic	3.774	24.926	ISM and star formation	Giant Molecular Clouds
2022.1.00951.S	NGC_5236	13:37:00.919	-29:51:56.740	6	0.0891	227.37..245.512 GHz	2024-04-17	0	0.248	1.389	12m		3.411	24.628	Local Universe	Spiral galaxies, Galactic

The interface has several other options as well. These include copying the link to the search results, selecting the columns that are displayed and saving the search results.



Selected data can be downloaded by clicking on the green “Explore and download” box at the top right. This will open a new display within the browser window listing the files associated with the selected dataset.



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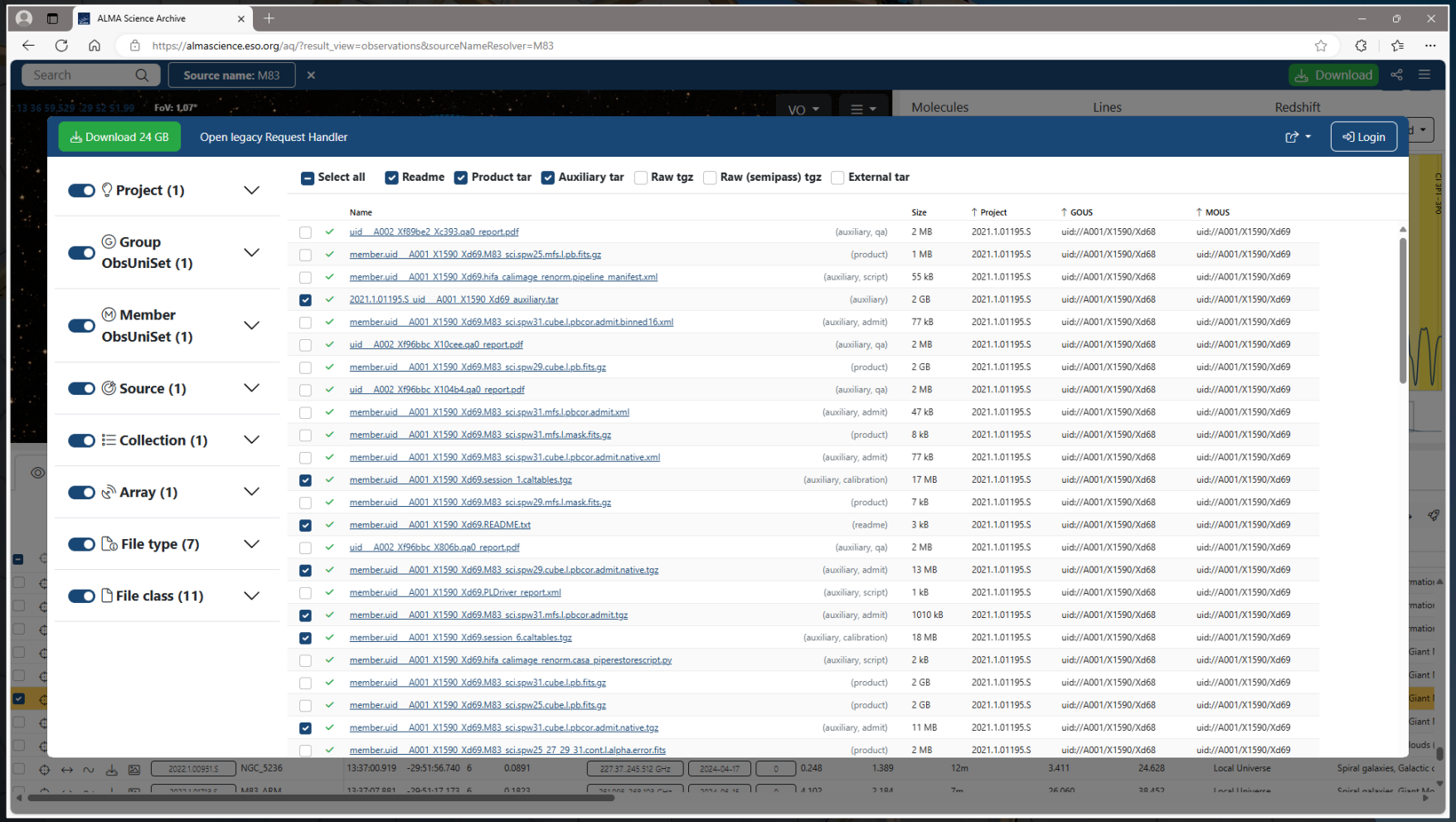
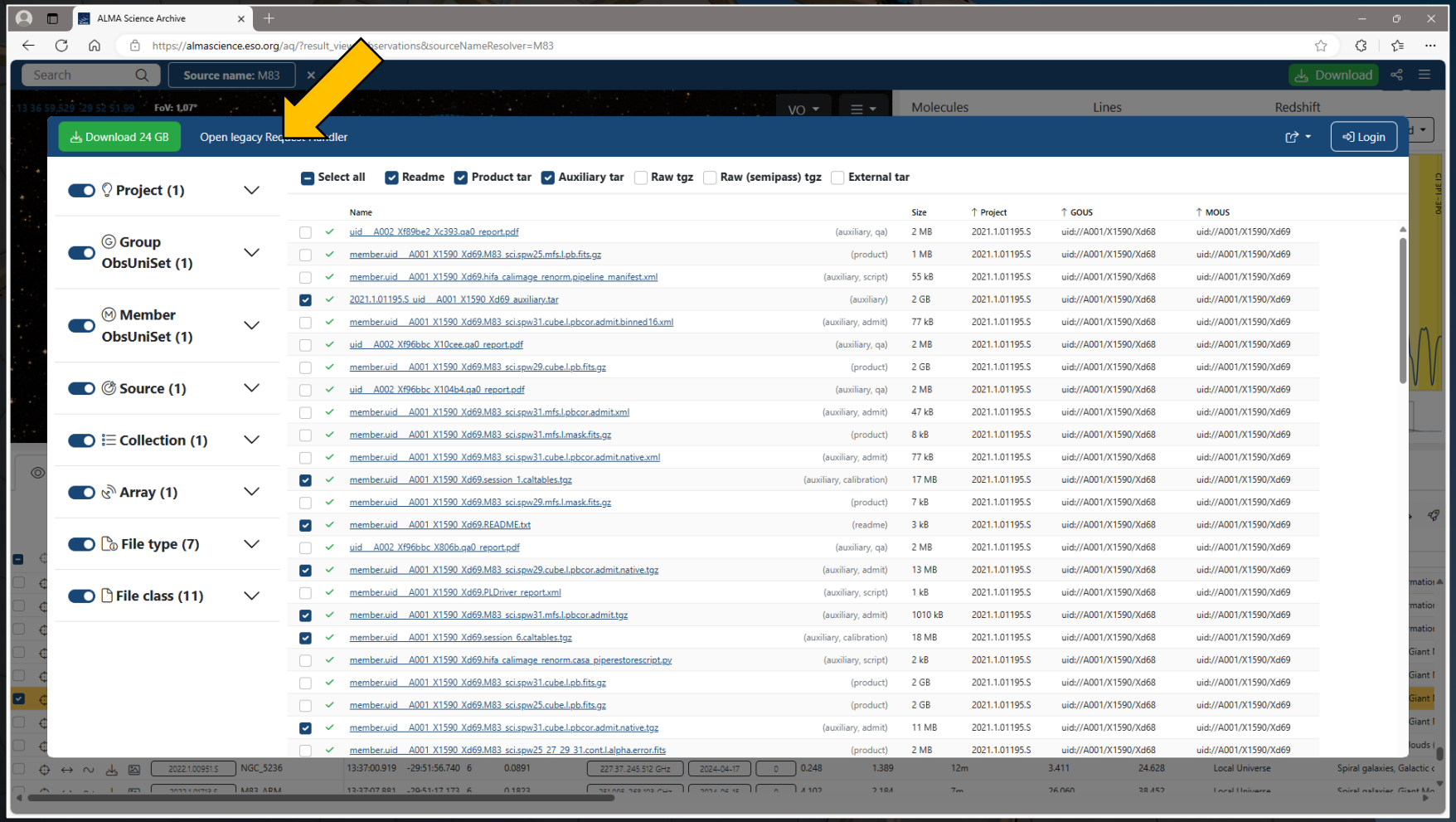
The Request Handler will display all of the files associated with the selected Scheduling Blocks.



Each Member OUS (or Scheduling Block) may have the following files available for download:

product	Final images and image cubes
auxiliary	A file containing logs, quality assurance information, scripts, and calibration data
raw	Raw visibility data
external	Enhanced data products (including enhanced images or visibility data) created after the data delivery

The legacy version of this page is accessible through a link at the top, but it works poorly for projects with multiple Scheduling Blocks.



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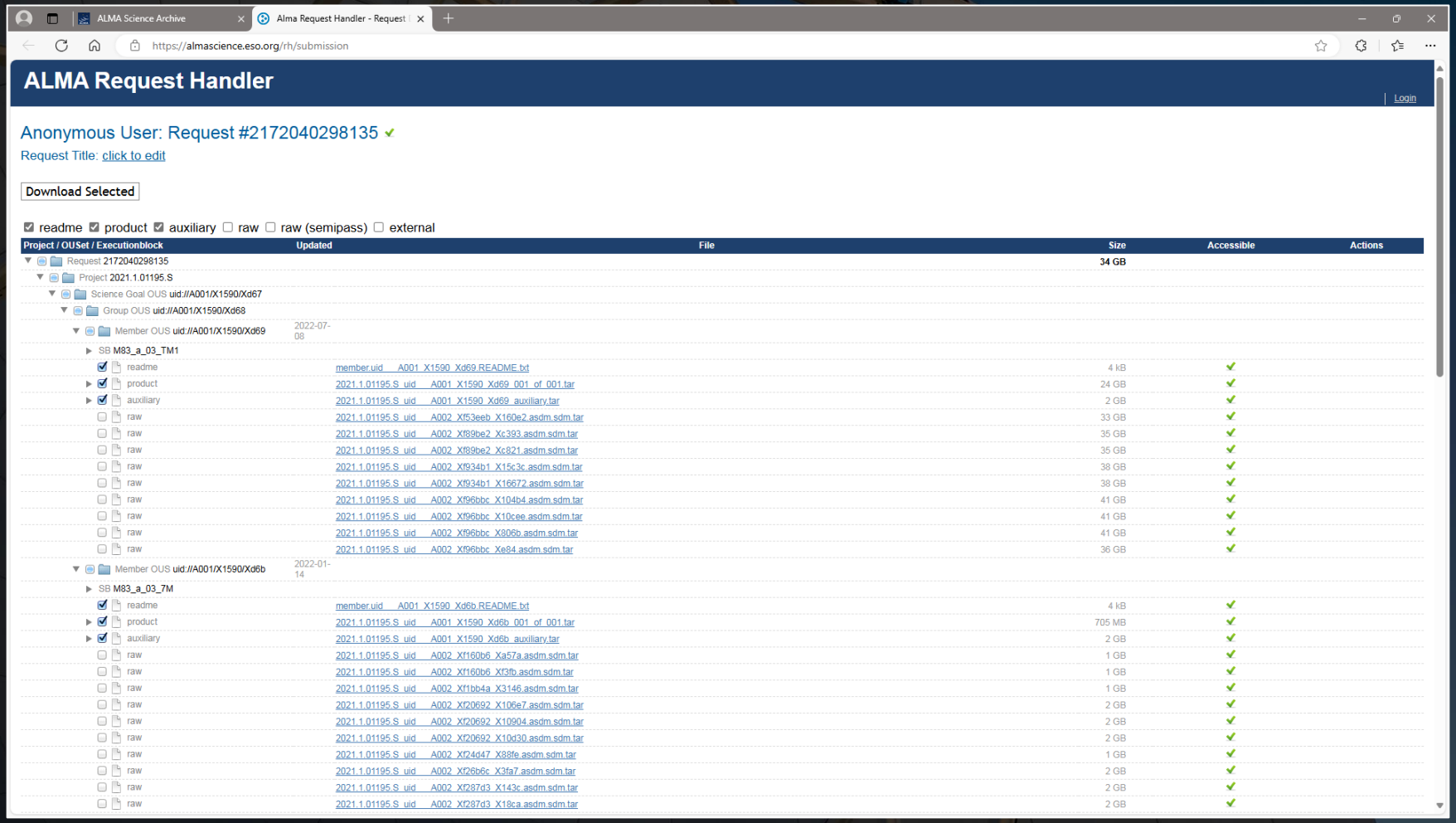
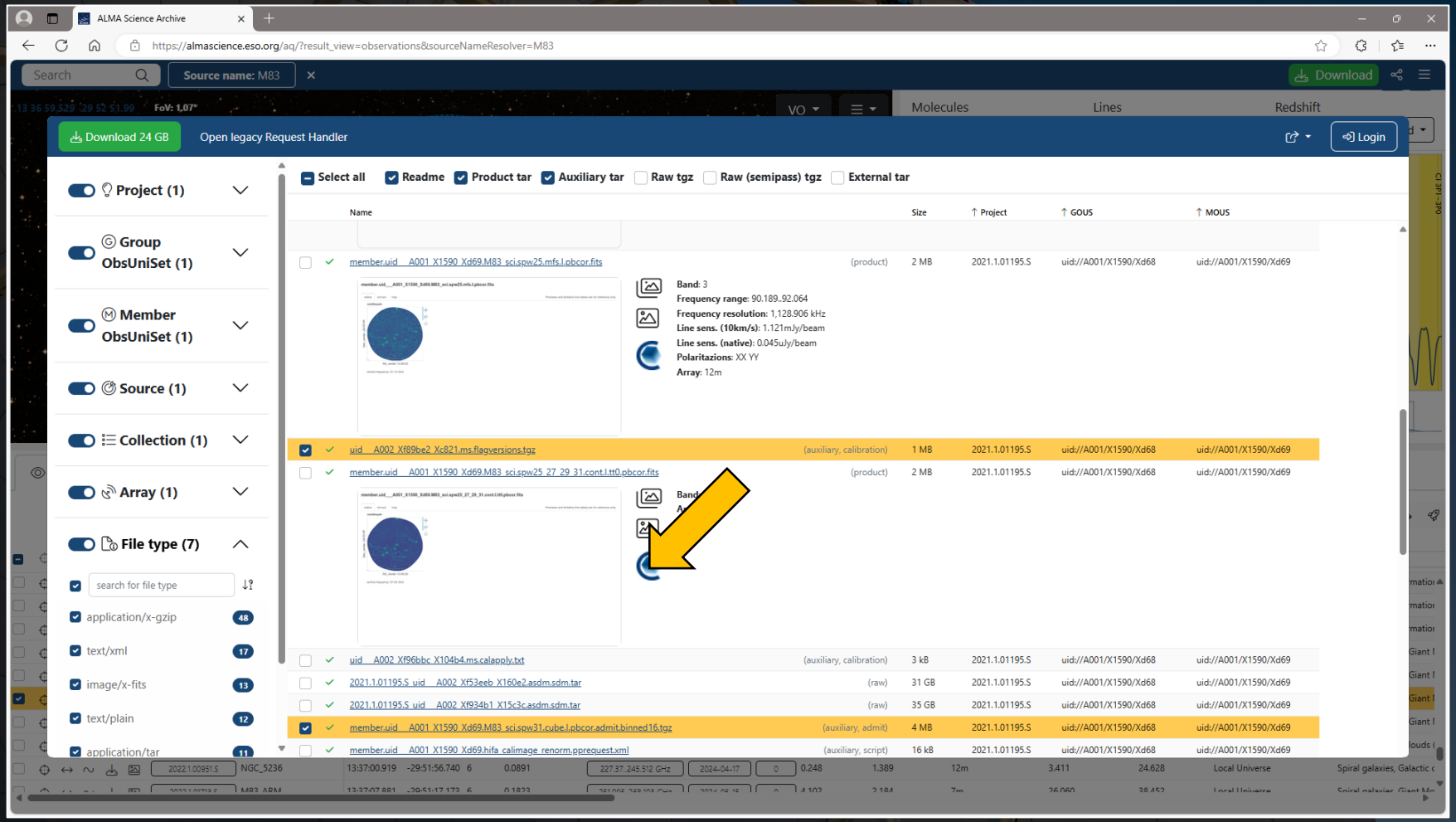


Clicking on one of the C symbols next to an image will display the image in CARTA.



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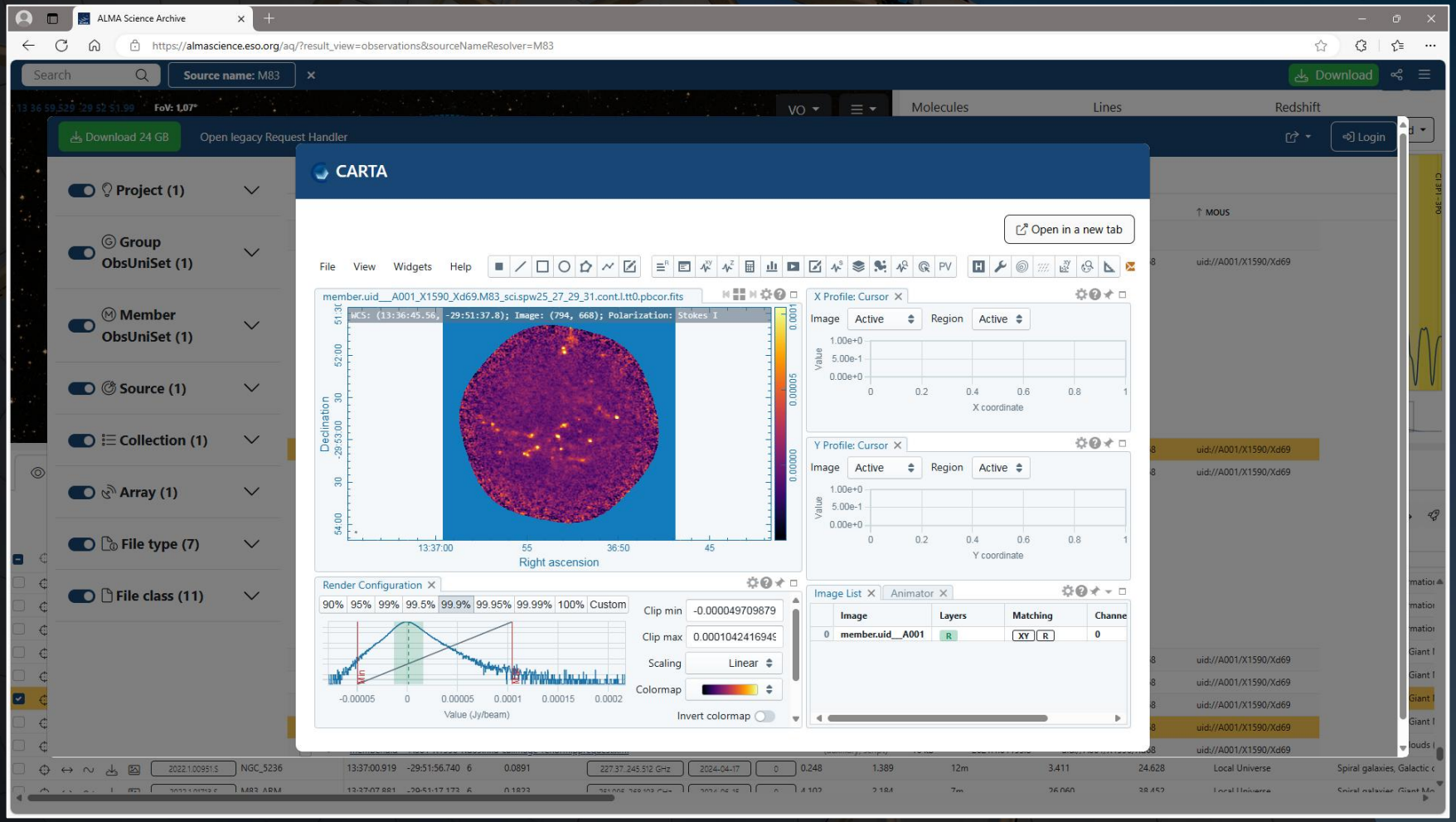
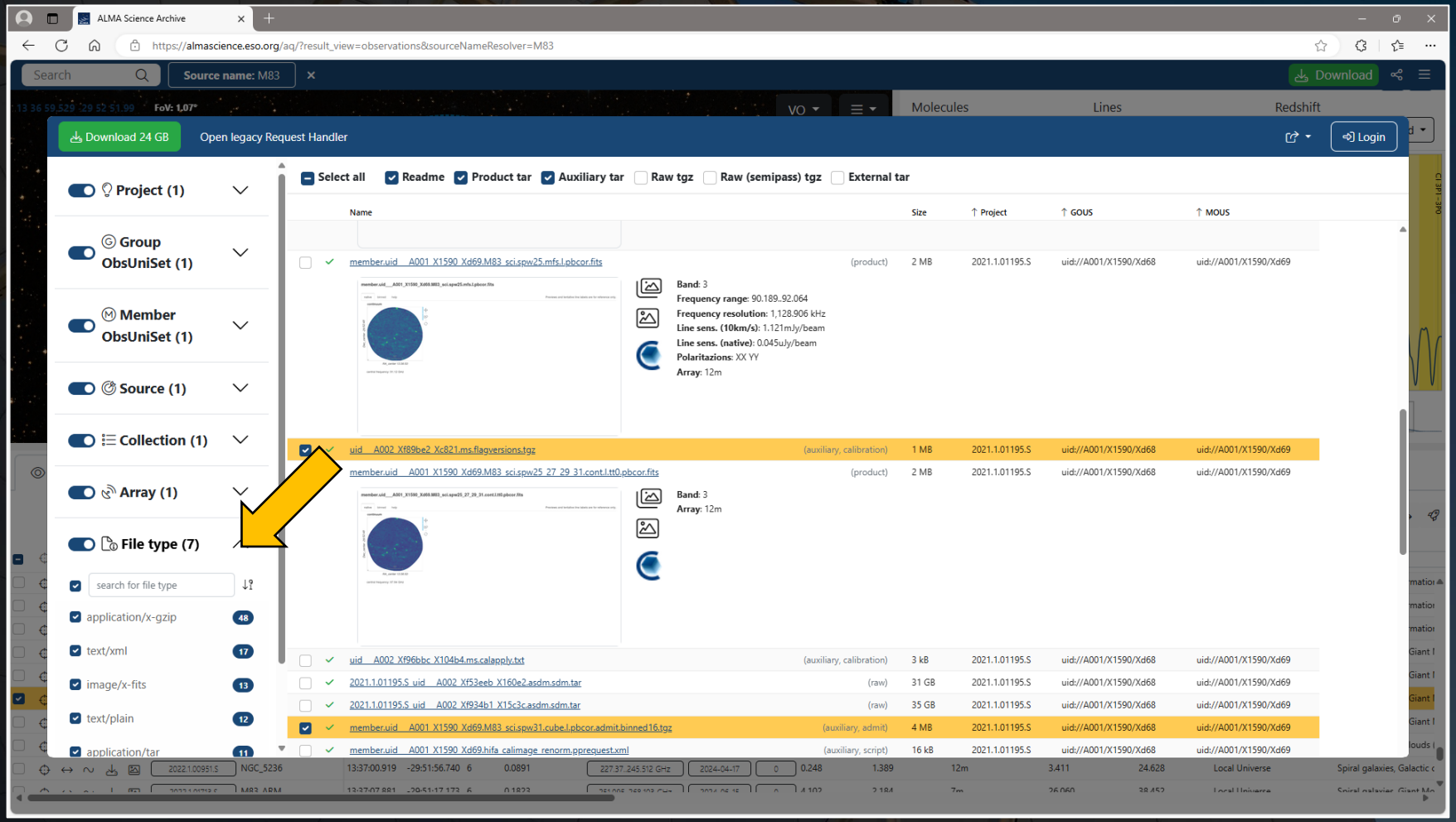
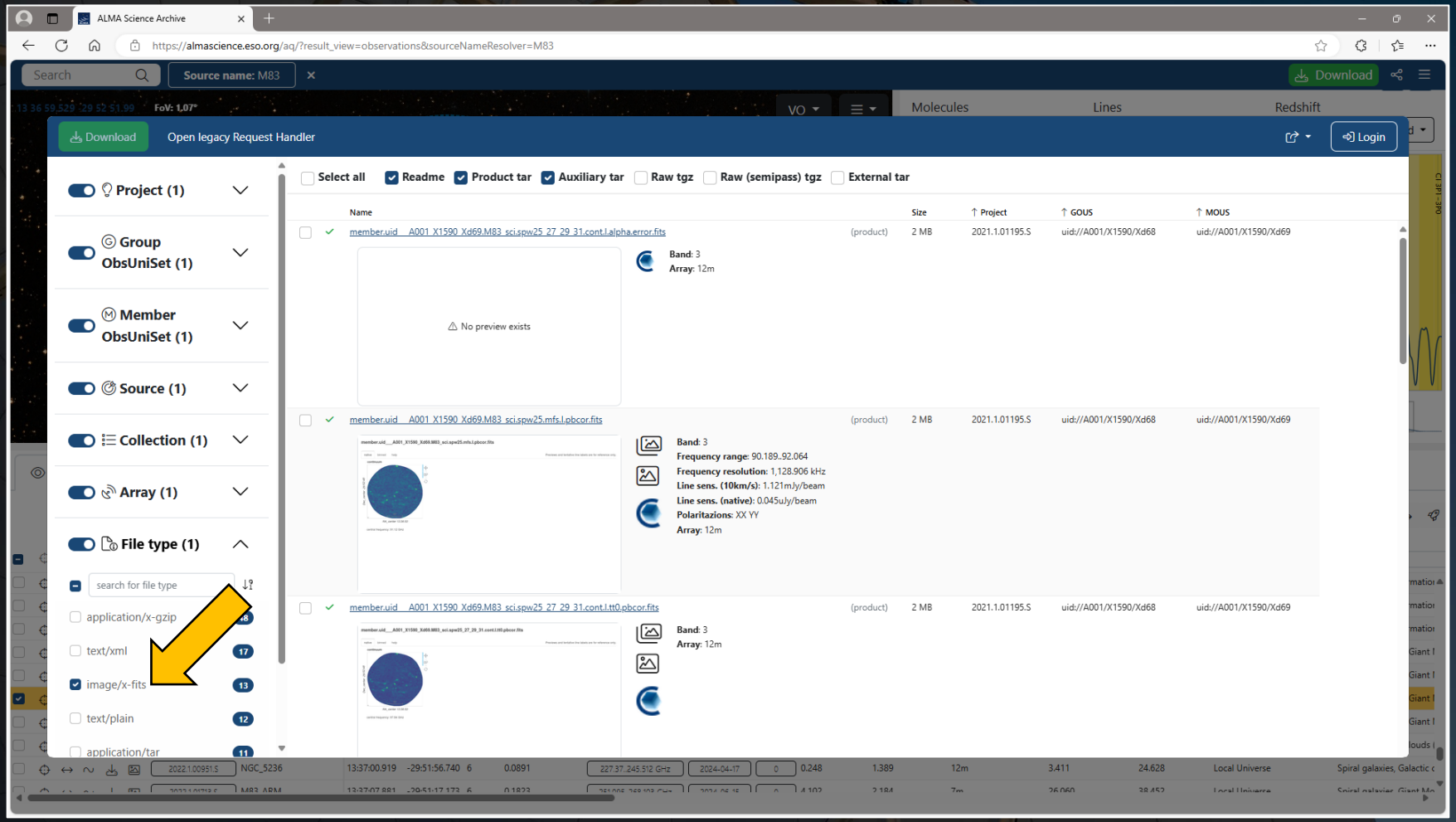


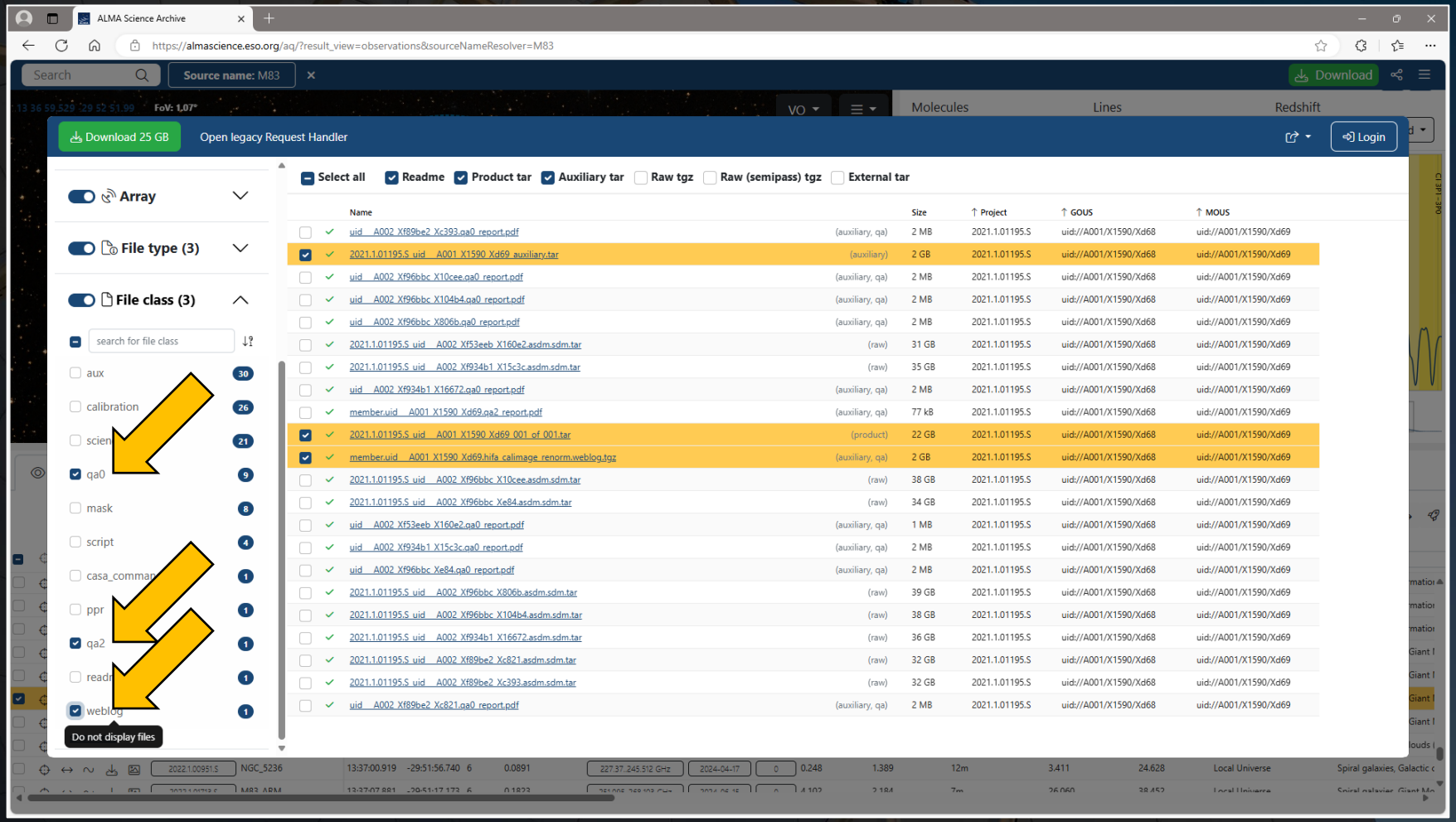
The search results can be filtered using the drop-down menus on the left. This is useful for selecting subsets of these files for different purposes.



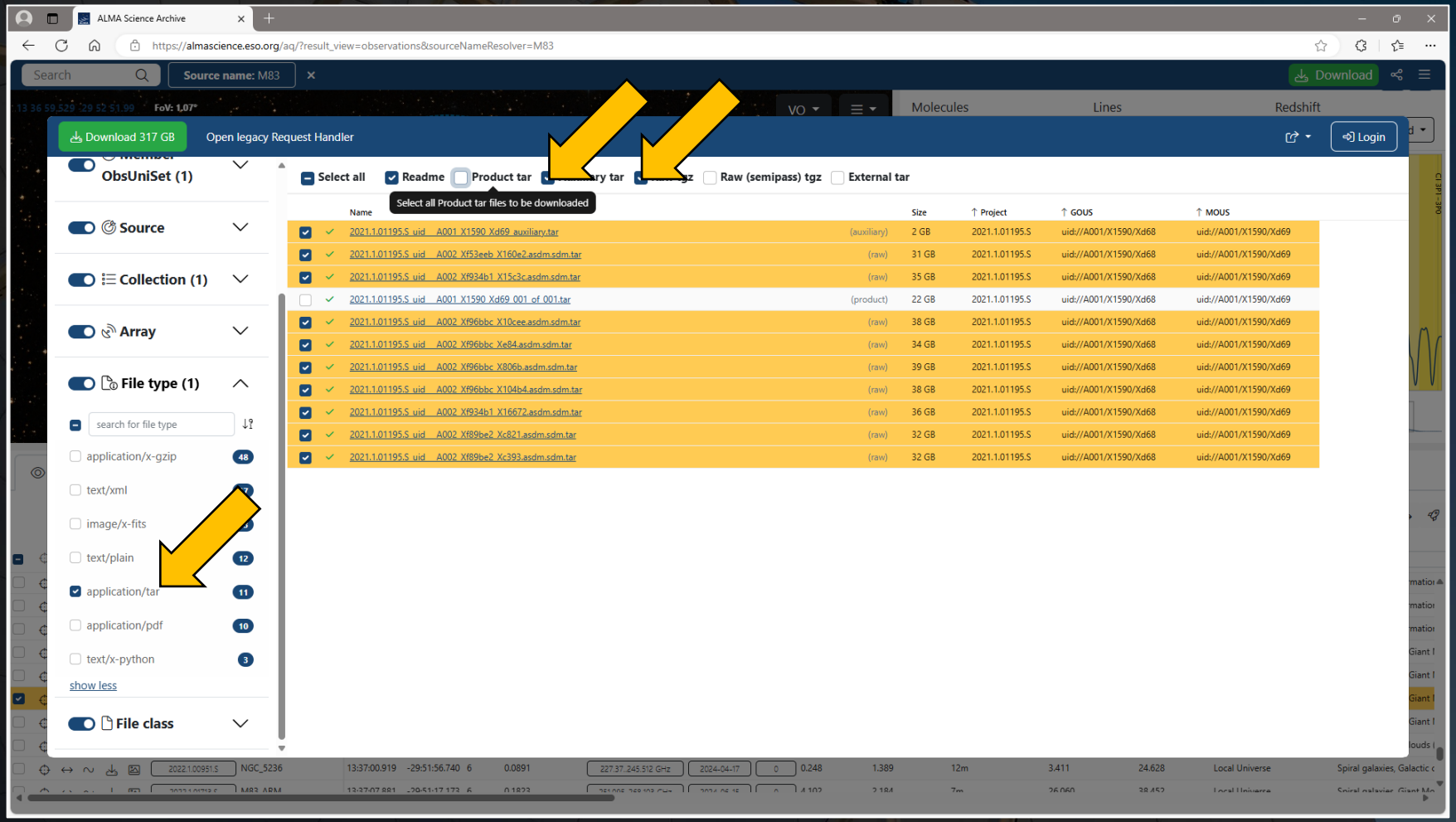
To select just the images, go to "File type" and select only "images/x-fits".



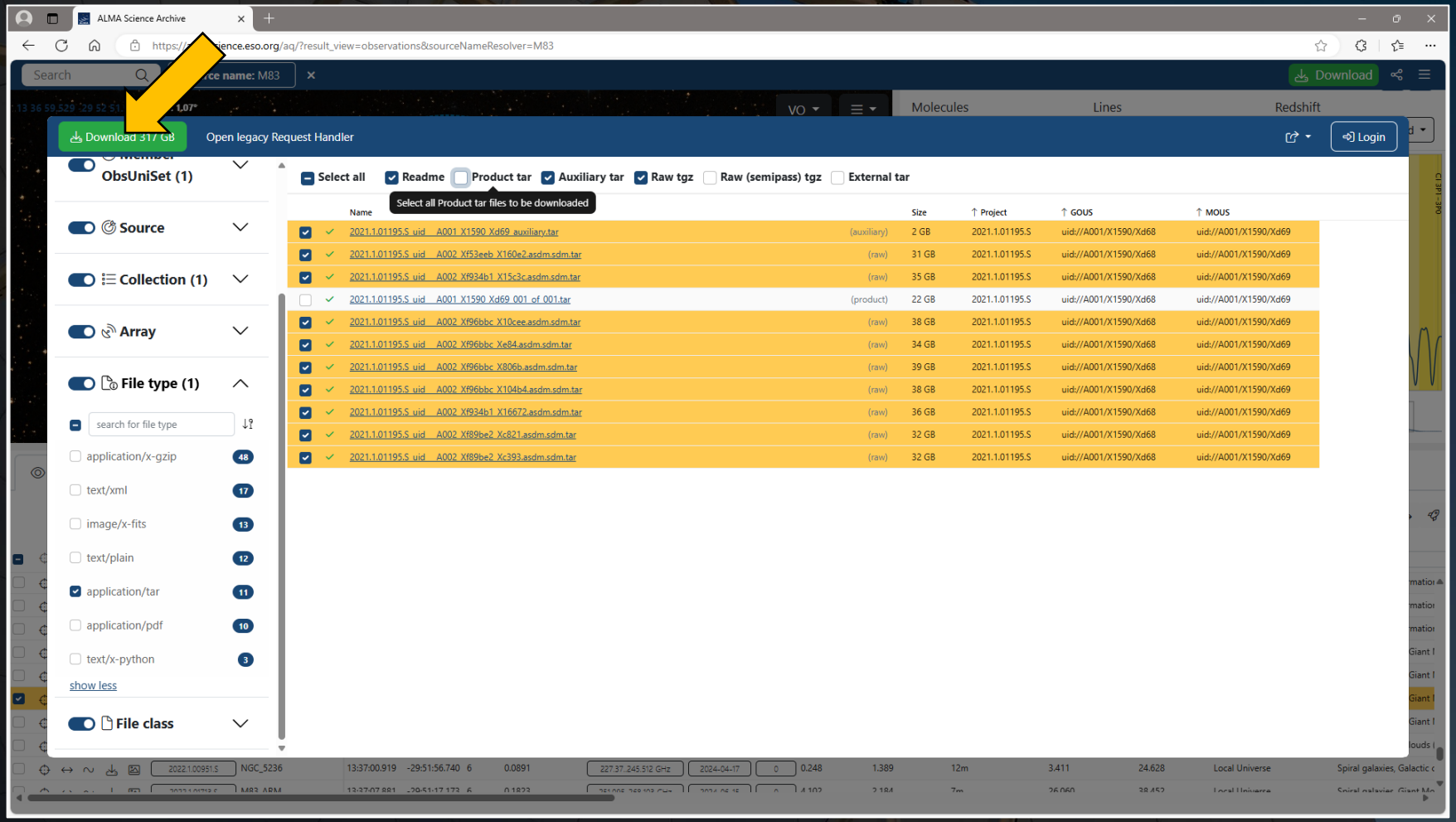
To select just the Quality Assurance filts, go to "File class" and select only "qa0", "qa2", and "weblog". (Some tar files associated with the project will also be displayed, but these can be ignored.)



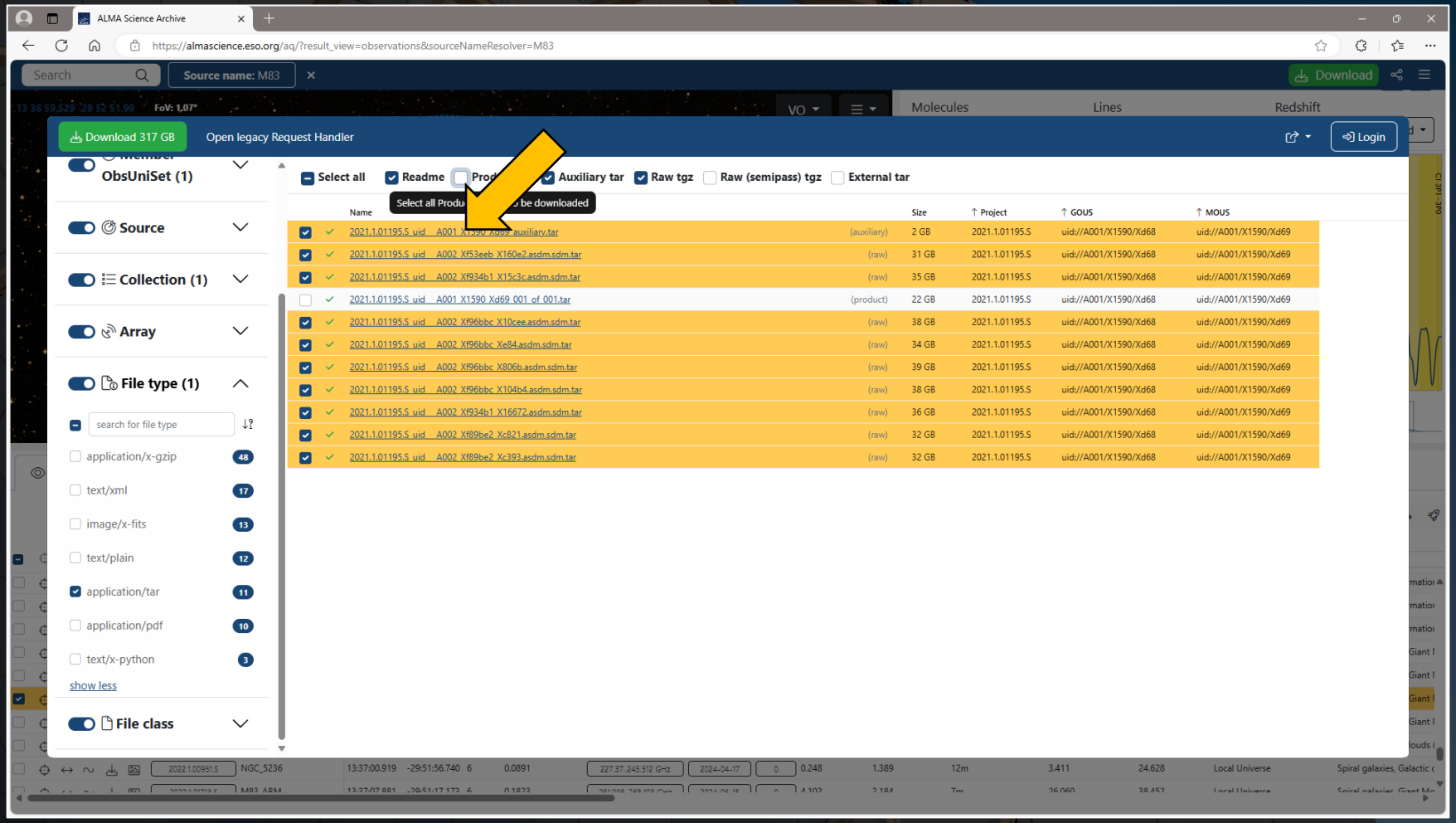
To select just the files needed to recreate the calibrated visibility data (for creating new images), go to "File type" and select only "application/tar". After that select all of the files with "(raw)" or "(auxiliary)" after their names.

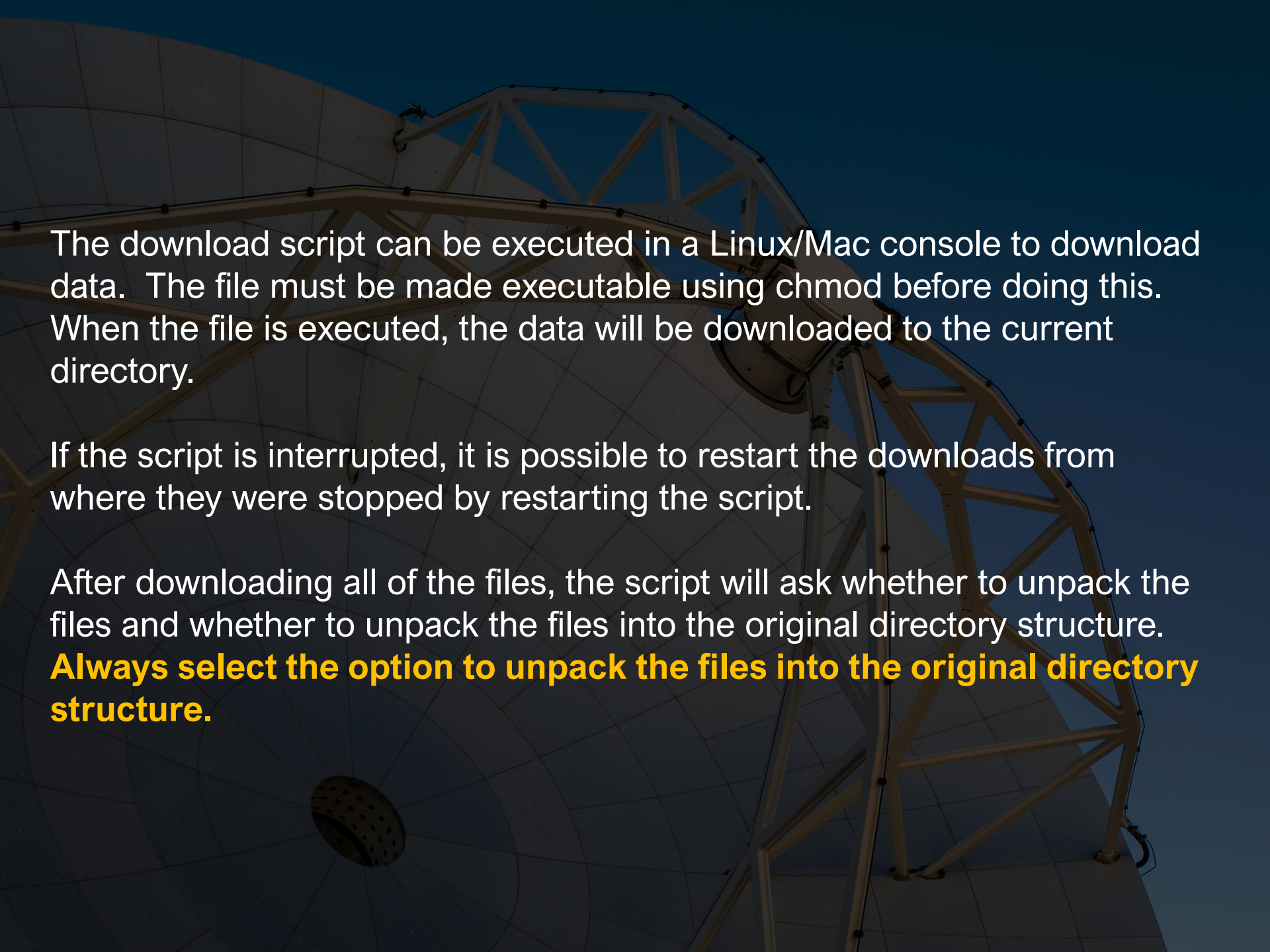


After selecting the data for download, the download process can be started by clicking on the Download button in the upper left corner of the Request Handler. This will generate a download script. It is also possible to select the individual files for download by directly clicking on the filenames.



After selecting the data for download, the download process can be started by clicking on the Download button in the upper left corner of the Request Handler. This will generate a download script. It is also possible to select the individual files for download by directly clicking on the filenames.





The download script can be executed in a Linux/Mac console to download data. The file must be made executable using chmod before doing this. When the file is executed, the data will be downloaded to the current directory.

If the script is interrupted, it is possible to restart the downloads from where they were stopped by restarting the script.

After downloading all of the files, the script will ask whether to unpack the files and whether to unpack the files into the original directory structure. **Always select the option to unpack the files into the original directory structure.**