CORNISH Co-Ordinated Radio 'N' Infrared Survey for High-mass star formation

Public Private

Source Summary Page: G019.9448+00.9126

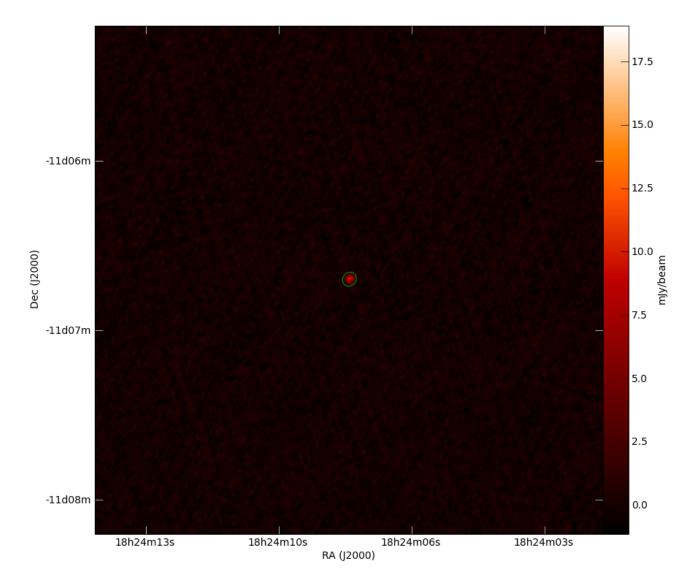
Useful Searches

Catalogue services

SIMBAD Search HEASARC search (search all VizieR Cat).

No RMS Survey catalogue matches.

CORNISH 5 GHz Radio Continuum Data



5 GHz radio image (FITS FILE)

Annotations: Green = current source, White = high-reliability sources ($\geq 7\sigma$), Yellow = 6 to 7σ sources, Red = 5 to 6σ sources. Click within 10" of any other source to jump to its' data summary page.

CORNISH Catalogue Entry

Source Name	Source Type	RA (J2000)	Dec (J2000)	Flux (mJy)	Peak (mJy/bm)	RMS Noise (mJy/bm)	Angular Size (arcsec)	Sigma	Likely Artifact?
G019.9448+00.9126	<u>PN</u>	18:24:07.90	-11:06:41.95	29.79	10.81	0.38	2.49	26.3	<u>Unlikely</u>
Uncertainties:	Confidence: Good	0.117"	0.117"	3.07	1.05		0.079	 	

Click on the "likely artifact" edit the source artifact status or the "source type" to classify the source type.

Artifact Inspection Notes (last 2 entries only)

Date	User	Likely Artifact?	Notes
2012-05-25 11:59:27	jsu	Unlikely	
2010-09-04 00:00:00	crp	None	None

Source-type Identification Notes (last 2 entries only)

Date	User	Source Type	Confidence	Notes
2010-09-04 00:00:00	crp	PN	Good	

CORNISH Catalogue Flags:

In cluster?a	No	Near survey edge?b	No	High-noise region? ^c	No
High 5σ density? ^d	No	Near bright source? ^e	No	Smooth Weighting? ^f	No
Overlap 5σ? ^g	No	Overlap 7σ? ^h	No	Nearest 5σ source	G019.9561+00.8579 (d = 200.9")
Nearest 7σ source	G020.0760+00.9320 (d = 477.6")				

Notes:

The large-scale CORNISH environment

Density map of sources above 5σ.

Below is density-map of source counts above 5 σ summed under a circle of radius 8-arcmin. Regions showing locally elevated source counts likely contain greater numbers of spurious sources and should be inspected carefully. The position of the current source is marked with a cross.

^a Source is within 12" of another source.

^b Source is within 2' of the survey edge.

^c Source is in a region with a RMS-noise greater than 0.45 mJy/beam

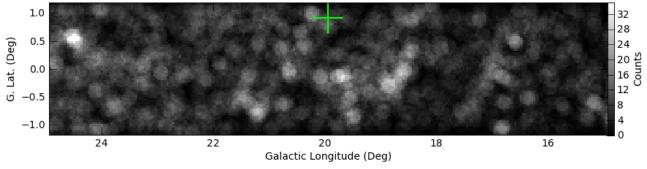
^d Region contains greater than 7 detections of 5 to 7-sigma sources.

^e Source is within 3' of another source which has a peak flux density greater than 500 mJy/beam.

f Source is within the half-power primary beam-width of a field which was imaged using the smoothed weighting scheme.

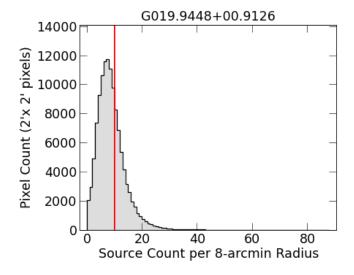
 $^{^{\}rm g}$ One or more 5 σ to 7 σ source overlaps with the current source.

 $^{^{\}text{h}}$ One or more 7σ+ sources overlaps with the current source.



Notes:

The map above is sampled in 2x2 arcminute bins (pixels) whose greyscale intensity is scaled to the number of sources detected within a radius of eight arcminutes. Only the local ten-degree region of the Galactic plane is plotted.



Notes:

The histogram above plots the distribution of source-density values measured over the whole survey area (as per the density map immediately above). The red line illustrates the value of the current source. If this lies in the upper wing of the distribution the source is more likely to be an artifact.

Large CORNISH images and cone-searches

Click on the links below to cutout large CORNISH mosaics or perform preset cone-searches.

Actions:				
View 10' Image	View a 10' image centred on the source (May take a few seconds.)			
View 20' Image	View a 20' image centred on the source (May take a few seconds.)			
Cone search < 1.5'	Perform a cone search for sources within a 1.5' radius.			
Cone search < 5.0'	Perform a cone search for sources within a 5.0' radius.			

Other Radio Data

MAGPIS Radio Continuum Data

No matching MAGPIS radio data

NVSS 1.4 GHz Radio Continuum Data

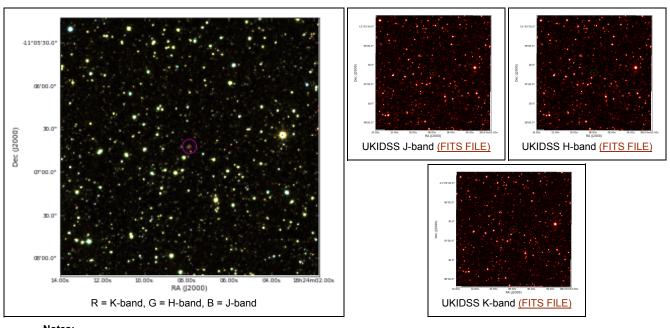
Use the form below to query the NVSS postage stamp server. The default settings open a JPEG image in a new tab, centered on the position of the CORNISH source. The resolution of NVSS is 45".

Size:	0.25 0.25	degrees

Image Type:	Contour Map	*
	Submit!	

Infrared Data

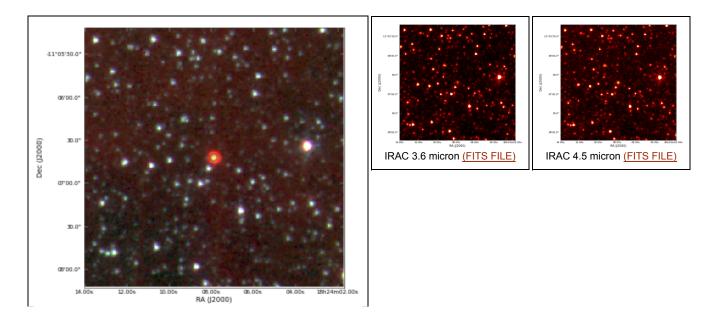
UKIDSS Near-Infrared Data

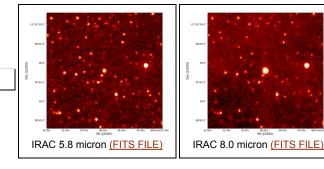


Notes:

The three near-infrared images above come from the UKIRT Infrared Deep Sky Survey (<u>UKIDSS</u>), specifically the Galactic Plane Survey (<u>GPS</u>). Each image has been rotated and regridded into Equatorial J2000 coordinates. The images are sensitive to K=18.3, three magnitudes deeper than 2MASS.

GLIMPSE Mid-Infrared Data





 $R = 8.0 \mu m, G = 4.5 \mu m, B = 3.6 \mu m$

Notes:

The Spitzer GLIMPSE (Galactic Legacy Infrared Mid-Plane Survey Extraordinaire) data have been obtained from the IPAC IR science archive and converted into Equatorial J2000 format. HII regions and PNe appear as red sources in the RGB image on the left. The environment of HII regions generally exhibits extended emission from poly-aromatic hydrocarbons in the 8-micron images.

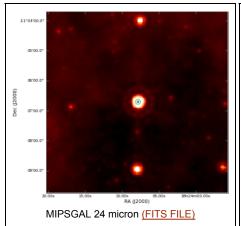
GLIMPSE point source catalogue matches

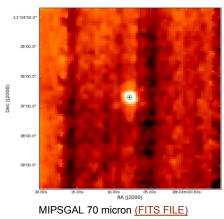
Glimpse Name	Offset (arcsec)	3.6 flux (mJy)	4.5 flux (mJy)	5.8 flux (mJy)	8.0 flux (mJy)
G019.9446+00.9124	0.74	15.000	23.200	48.990	188.060
Reliability:		0.97	0.99	1.00	1.00

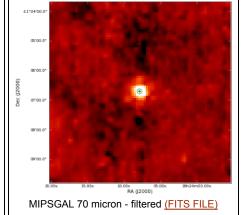
Notes:

CORNISH and GLIMPSE sources were matched within a radius of 2 arcseconds. The matching reliability in each band was calculated using Eqn. 2 of Sutherland & Saunders (1992) (ADS) with a sigma of 0.6 arcsec. From experience so far any value less than 0.98 would indicate that cross match is not real - the clear matches are all at 0.99 or 1.00. We may change the 0.6 arcsec number once we have a sample of real matches to play with but it is doing a pretty good job for now.

MIPSGAL Mid/Far-Infrared Data







Notes:

The 24 and 70-micron MIPSGAL survey data was downloaded from the IPAC IR science archive and converted into Equarorial J2000 coordinatres. The standard 70-micron images contain significant artifacts. A 'filtered' version is also available which have had some artifact corrections applied and also emission on large scales removed.

Millimetre Continuum Data

Bolocam 1.1-mm Continuum Data

No matching Bolocam data

 $Comments \ or \ questions \ should \ be \ directed \ towards \ \underline{Cormac \ Purcell}. \ | \ \underline{Privacy \ Statement}.$