

Multi-wavelength study of massive star forming region AFGL 4029.

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We are conducting a survey of several regions of high-mass star formation and prominent photo-dissociation regions (PDR's) to study their content and structure. The observations include Spitzer/IRAC observations, ground-based optical and NIR imaging, and optical spectra of objects and locations in the molecular clouds. The objective of the survey is to have a better understanding of the processes involved in high mass star formation by determining the characteristics of the stars detected in these regions, by studying the massive young stars and their interaction with the surrounding interstellar medium (ISM) and investigating the properties of the ISM in which these stars form.

We present Spitzer, ground-based optical and NIR imaging and optical spectra of massive star forming region AFGL 4029 in W5. We determine the properties of the constituent stars using 1-8 um infrared spectral energy distributions. We use the spectral types of stars and spatial distribution of Class 0 and I objects to investigate the evolutionary state of the region.

References

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