## CO J=1-0 Study of M82

## Sungeun Kim<sup>1</sup> and Eric Keto<sup>2</sup>

<sup>1</sup>Dept. of Astronomy and Space Sciences & Astrophysical Research Center for the Structure and Evolution of the Cosmos, Sejong University <sup>2</sup> Harvard-Smithsonian Center for Astrophysics

We have made aperture synthesis observations of the CO J=1-0 line emissions in the M82. The BIMA and the OVRO have surveyed the entire M82 in the CO J=1-0 line. An upper limit of the integrated intensity in the inner part of M82 has been discussed and the CO J=1-0 emission line map has been compared to the CO J=2-1 line emission map. We also discuss the line ratio of CO J=2-1/CO J=1-0 and photodissociation of CO molecules by the interstellar UV radiation field.