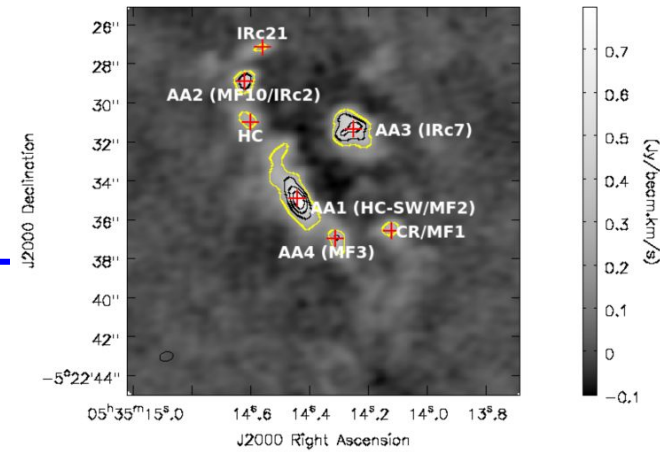


RA11: Spatial distribution of acetaldehyde in Orion KL : observations and chemical modeling

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By examining the **ALMA archive data** with an interpretation of **chemical modeling**, we aim to securely search for **acetaldehyde** (AA) toward Orion KL and to understand the **chemical origins** of other aldehyde-like species as well as AA



- Data calibration
- Continuum subtraction
- TClean image
- Primary beam correction

**Identification of
AA emission
components**

- 5 Bright transitions without severe blending
- N(AA) & Trot

**Chemical
modeling**

**ALMA data
processing**

- Moment 0 map
- 4 emission components above 5-sigma (AA1-AA4)

**Line identification /
modeling**

- Modeling the observed abundance ratios between HCO-bearing species
- Formation / Destruction pathways of AA

