

Images of Comet 9P/Tempel 1 from February to June 2005

Provider: B. Mueller

Reviewer: M.S.P. Kelley

Overview

- KPNO 2.1 m + CCD.
- R-band and HB filter set.
- Images of Tempel 1, standard stars, and instrument calibrations.

Calibration

- Both raw and reduced data are provided.
- Not all images can be calibrated, but most are **bias and flat field corrected** (CCD shutter issues noted in dataset.cat).
- Tables of **conversions to flux density** are provided.
 - **(Lien)** some *individual files* are not listed (dataset.cat needs to describe why).
- **(Lien)** **FILTER_NAME** should be names, rather than numbers (numbers belong in **FILTER_NUMBER**, if needed).

Targets

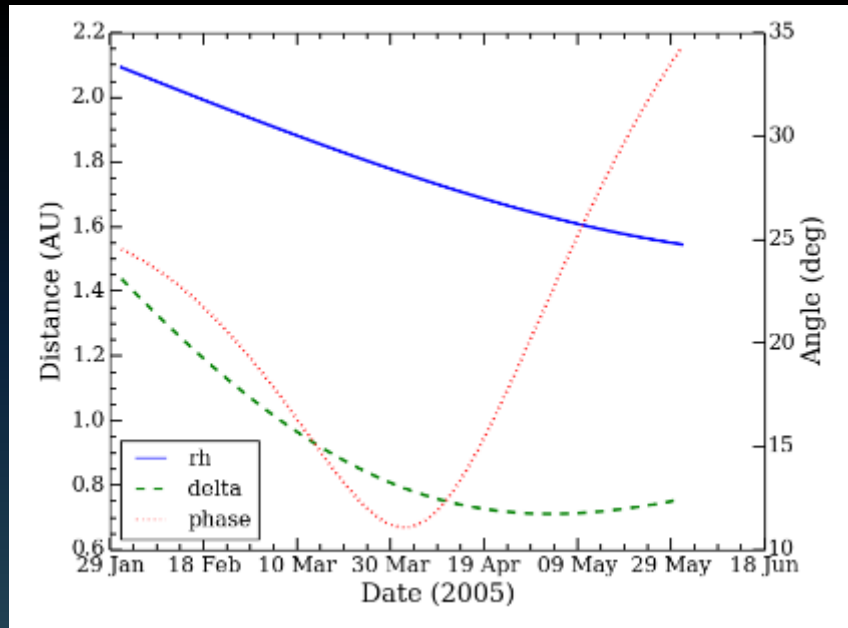
- Comet and star (x, y) positions provided in tables.
- 0-based indexing? (Lien?)
- (Lien) Bad star names in 2005_may15/sa_110 (easy fix).
- (Lien) Missing comet file from 2005_april09.

Data exercise

- Combine all comet images into two movies:
 - Remove image background.
 - Extract a sub-frame centered on the comet.
 - raw movie:
 - All images.
 - Linear scale from 0 to \sim (comet max).
 - cal movie:
 - R-band images.
 - Log scale from $1e-11$ to $1e-8$ erg/s/cm²/Å/pixel.

Movies

Why the brightness variations?



- Background?
- Seeing?
- Focus or tracking details that need to be noted?

Summary

- Straightforward dataset with few critical liens.
 - Other liens and minor comments are noted in my review write up.
- I consider it certifiable.