

GWP-S-660-05000

Assess sources spectroscopic variability

Dubath, Eyer, Hubert, Jankov, De Cat
and S. Udry for CORAVEL results

- ▶ Gaia expectation : some CORAVEL hints
- ▶ Workpackage content: (very) preliminary ideas

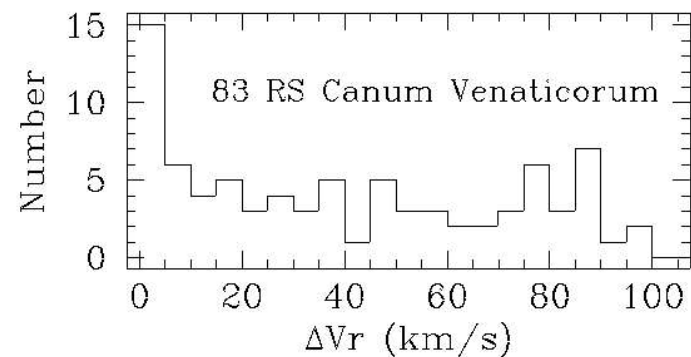
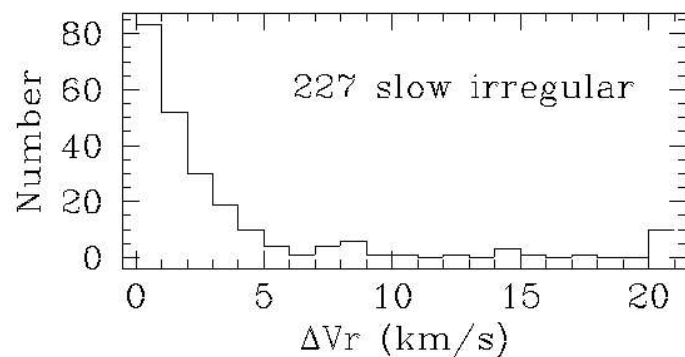
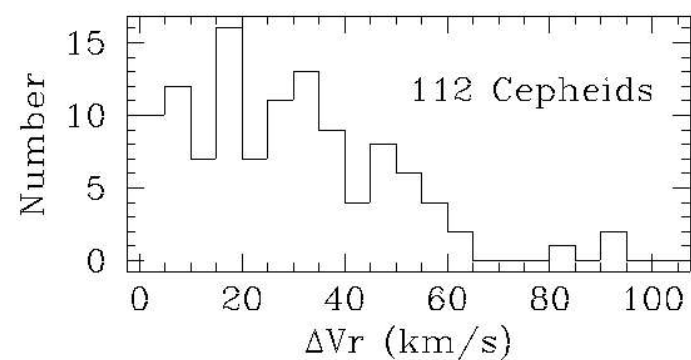
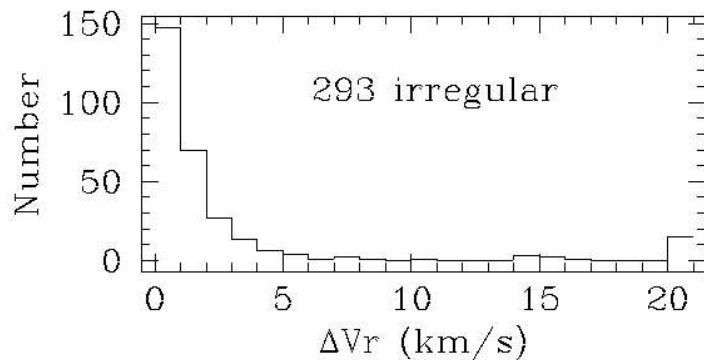
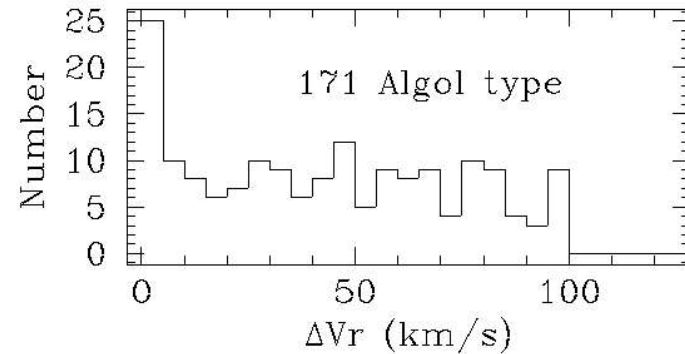
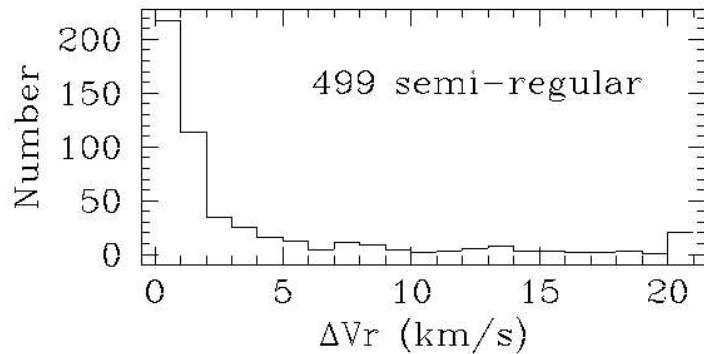


Gaia expectation

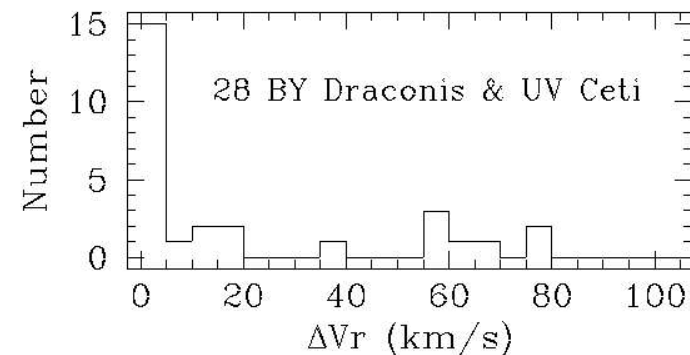
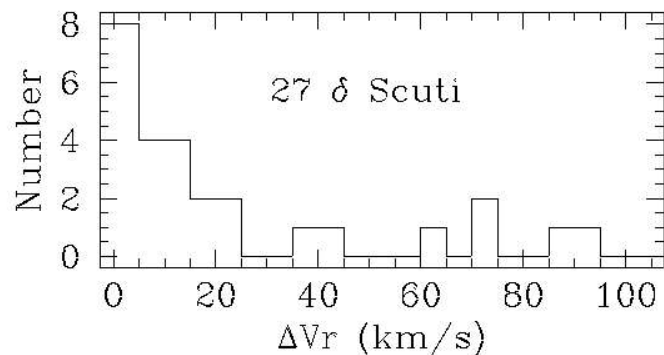
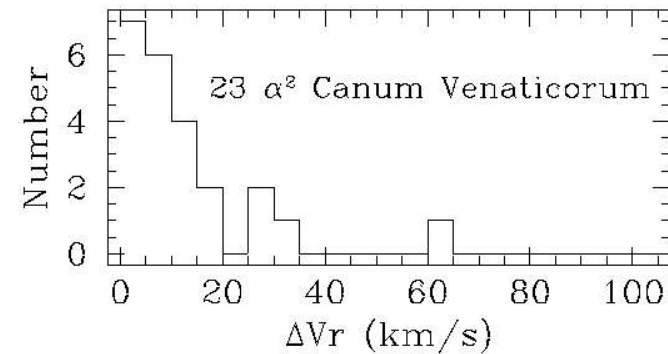
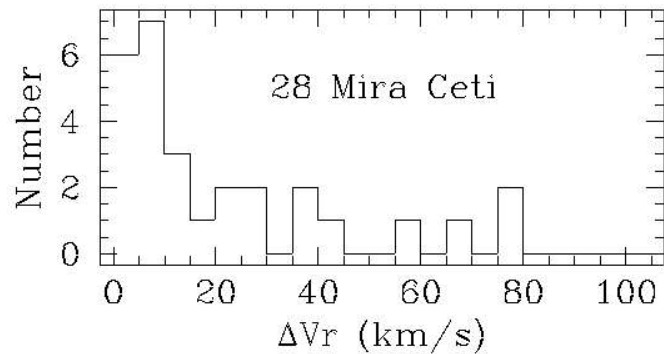
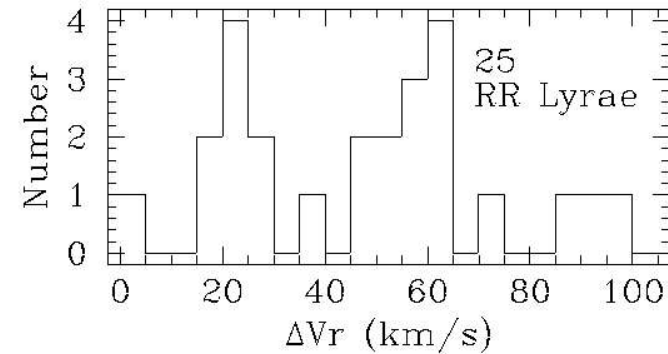
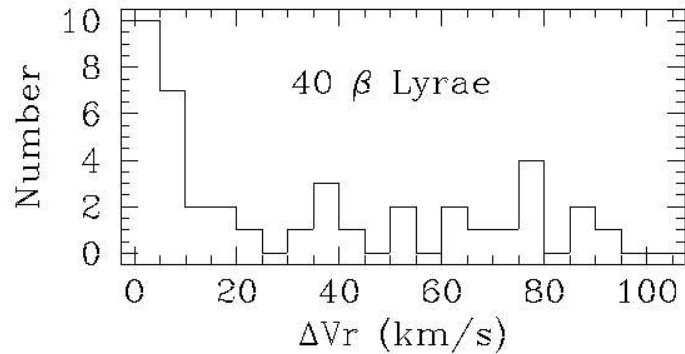
- Histogram of CORAVEL ΔV_r for all HIPPARCOS variables.

	HIPPARCOS	CORAVEL
Periodic	2712	565
Unsolved	5544	2249
Total	8256	2814

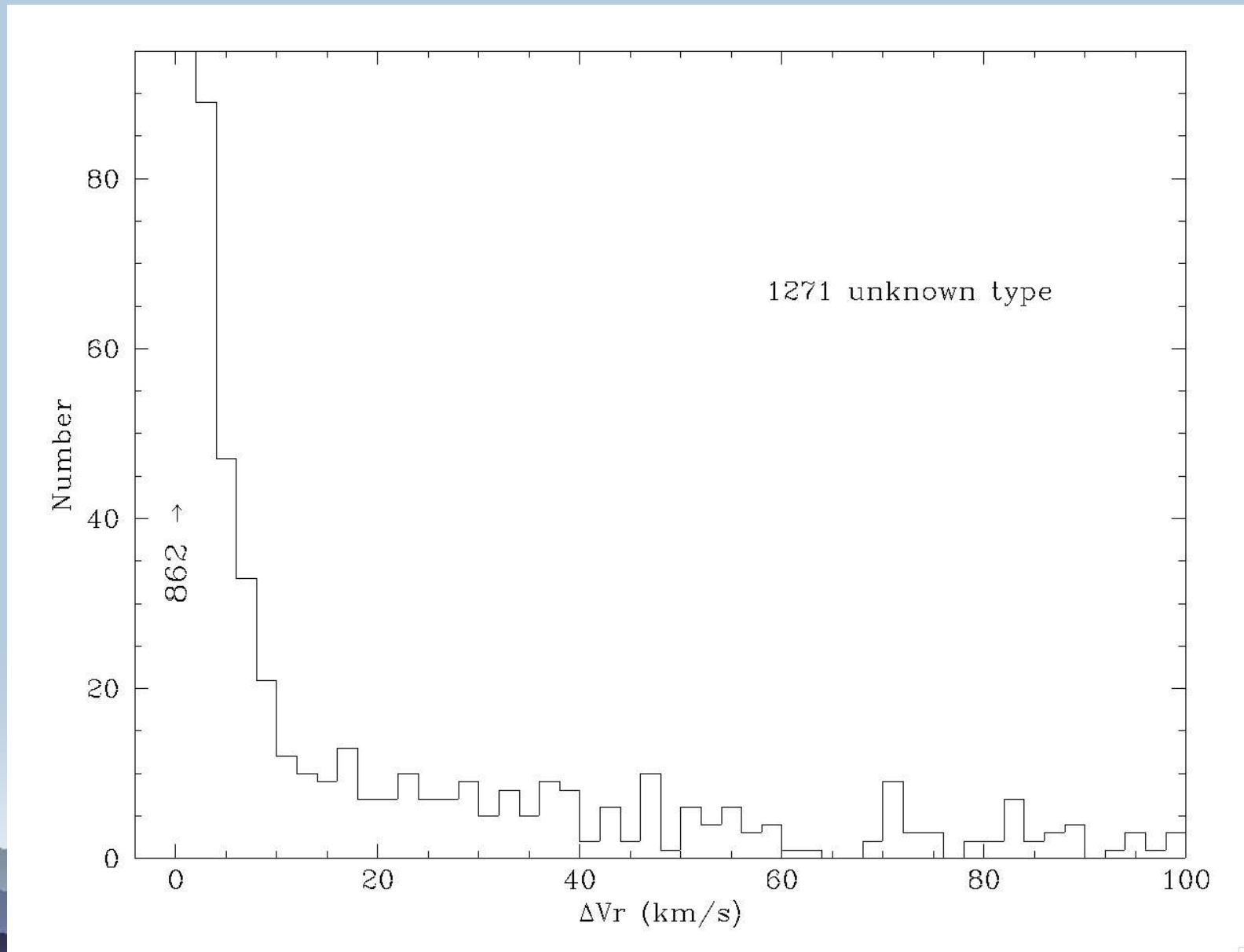
Histograms from CORAVEL measurements of 2814 HIPPARCOS variables (1)



Histograms from CORAVEL measurements of 2814 HIPPARCOS variables (2)

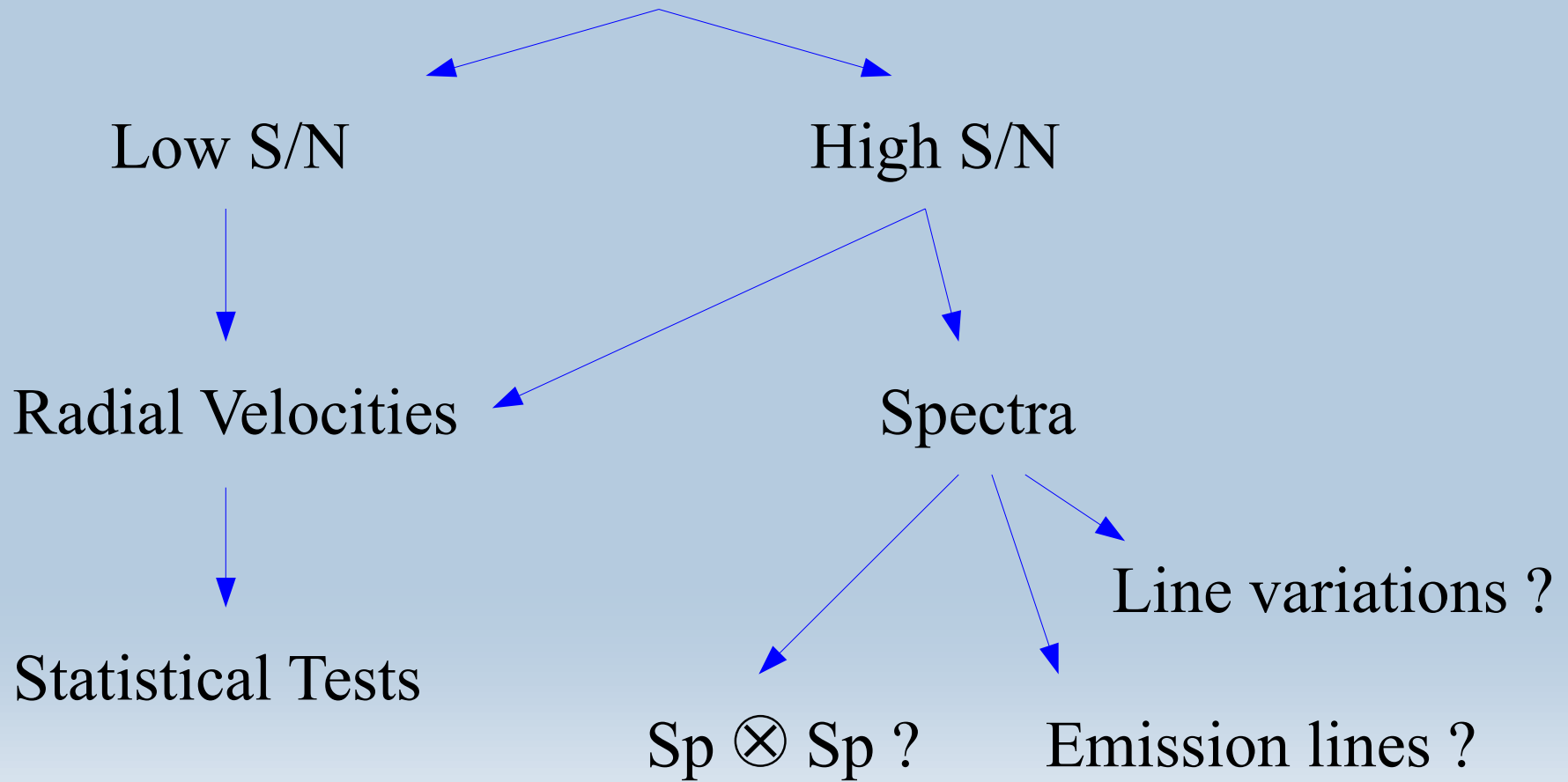


Histograms from CORAVEL measurements of 2814 HIPPARCOS variables (3)



Variability Detection

Preliminary Ideas



Next steps

- ◆ Statistical tests
 - ◆ Chi2, Skewness, Kurtosis (p_values)
 - ◆ Hypothesis tests on specific parameters
 - ◆ Robust tests
- ◆ Prototype codes depending on simulated data availability.