

# A Herschel follow-up to the SCUBA-2 cosmology legacy survey

- SCUBA-2 will perform two confusion limited surveys at 450/850 microns
- Herschel is needed to determine SED, temperatures, bolometric luminosities, star formations rates and photometric redshifts for these sources
- Selection at 450/850 traces dusty galaxies in an unbiased way out to high-z
- Knowledge of source position / greater angular resolution at 450 microns will allow extraction of Herschel counterparts below the confusion limit
- Full characterisation of luminosity function and evolution, star formation history and large scale structure / clustering and 250 micron source counts

Requirements:

0.6 sq. deg to 1 mJy rms at 250 micron and 110 micron      T < 900 hrs  
20-50 sq. deg to 3 mJy rms at 250 micron                      T = 200-500 hrs