

Stitching the Spectra Together

To create a final spectrum from the separate exposures in different grating settings, a two step process is followed. First, the spectra are interpolated onto a linear wavelength sampling, with a common start wavelength and 0.4Å pixel wavelength step. Then the pieces are stitched together into a single final spectrum. In regions of wavelength overlap between exposures, the overlap pixel values are averaged. In cases where gaps appear between grating settings, the gap pixels are set to 0.0001, and the gap regions are recorded in the header and in the data table. Since the individual pieces are fit to the same Pickles continuum SED, the overlap regions are automatically smoothly joined.