

Workshop

Stellar End Products: The Low Mass - High Mass Connection

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Title:

The SMC dust budget from fits to the multi-epoch, multi-band photometry of evolved stars

Abstract:

AGB/RSG-star outflows drive galactic evolution, requiring an accurate estimate of the ejection rate. We estimate the SMC global dust budget by fitting Spitzer photometry of AGB/RSGs with a grid of dusty evolved-star models (GRAMS; Sargent+ 2011, Srinivasan+ 2011). Our results agree with previous estimates (Boyer+ 2012, Matsuura+ 2013).

The dust ejection is dominated by a small fraction of very red sources. It is likely that such elusive sources hide in the IR data. Finding them is crucial to constrain the dust budget; sub-mm observations might identify similar candidates in the Milky Way/MCs.