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## Strong Optimized Conservative DM Constraints from Fermi-LAT Inclusive Spectrum

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The Fermi  $\gamma$ -ray Space Telescope has observed the sky since 2008. Dark matter annihilations or decays contribute to the measured diffuse  $\gamma$ -ray background flux. Using simulated data to first find the “optimal” regions of interest in the  $\gamma$ -ray sky, we present conservative bounds on annihilation cross section or decay lifetime competitive with other existing limits. We consider DM annihilation/decay into 10 different SM & BSM final states, 4 DM density profiles, and  $2 \text{ GeV} < m_{DM} < 10 \text{ TeV}$ , performing no astrophysical foreground modeling. (ArXiv: 1503.07169)

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