



Rosseland mean opacity κ , in units of $\text{cm}^2 \text{ g}^{-1}$, shown versus temperature (x -axis) and density (multi-color curves, plotted once per decade), computed with $X = 0.7$ and $Z = 0.02$. Curves that extend from $\log T = 3.5$ to 8 are from the Opacity Project (opacities.osc.edu). Overlapping curves from $\log T = 2.7$ to 4.5 are from Ferguson et al. (2005, ApJ, 623, 585). The lowest-temperature region (black dotted curve) shows an estimate of ice-grain and metal-grain opacity from Stamatellos et al. (2007, A&A, 475, 37).