$M = 0.5 M_{\odot}$ X = 0.70 Z = 0.03 $\gamma = 1.67$ 10 ×10²⁹ (a) mass (b) mass density $\times 10^4\,$ 10 8 ho [kg/m 3] 8 M [kg] 6 6 2 0 4 0.2 0.6 0.2 0.4 8.0 0 0.4 0.6 0.8 0 r/R_s [-] r/R_s [-] 15 × 10 15 10 ×10⁶ (c) pressure (d) temperature 8 10 6 **⊢** 4 5 2 0 0 0.2 0 0.4 0.6 8.0 0 0.2 0.4 0.6 0.8 r/R_s [-] r/R_s [-] 3 ×10²⁵ (e) luminosity (f) opacity 2.5 2 $\log \kappa \, [\mathrm{m}^2/\mathrm{kg}]$ 2 1.5 [M] 1 0.5 0 0 0.2 0.4 0.6 8.0 0.2 0.4 0.6 0.8 1 0 1 0 r/R_s [-] r/R_s [-]