Supplementary Materials

Planckian behavior of cuprates at the pseudogap critical point simulated via flat electron-boson spectral density

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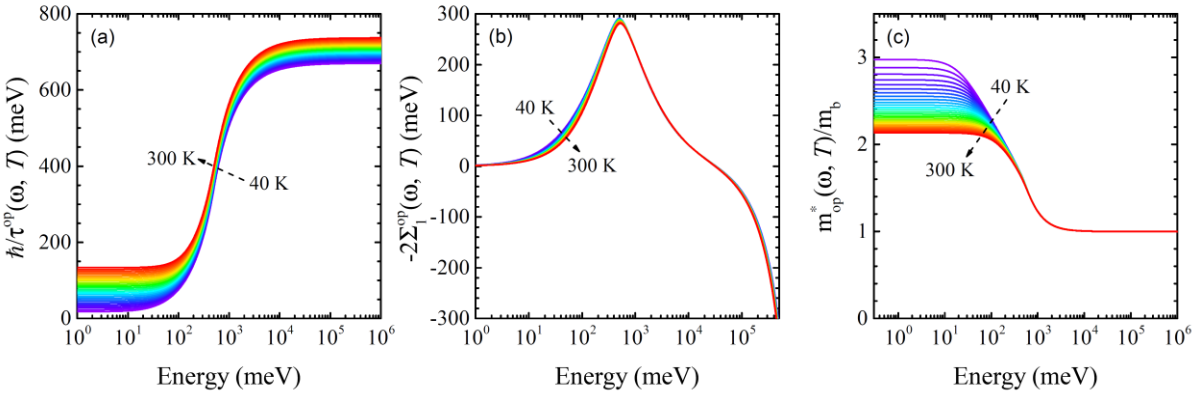

Figure S1: The optical scattering rate (a), the real part of the optical self-energy (b), and the optical effective mass (c) at various temperatures from 40 to 300 K by a 10 K increment in a wide spectral range. These quantities were obtained from the model (energy-independent and weakly temperature-dependent) EBSD function in the case of Planckian behavior.

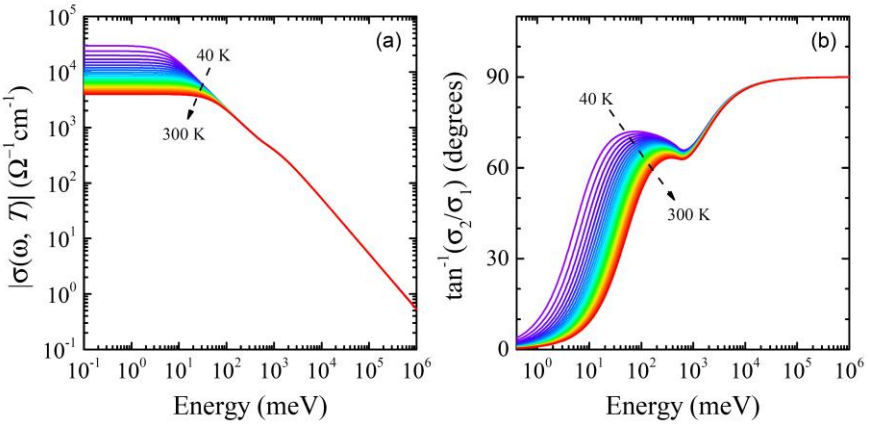

Figure S2: The amplitude (a) and phase (b) of the complex optical conductivity at various temperatures in a wide spectral range in the case of Planckian behavior.

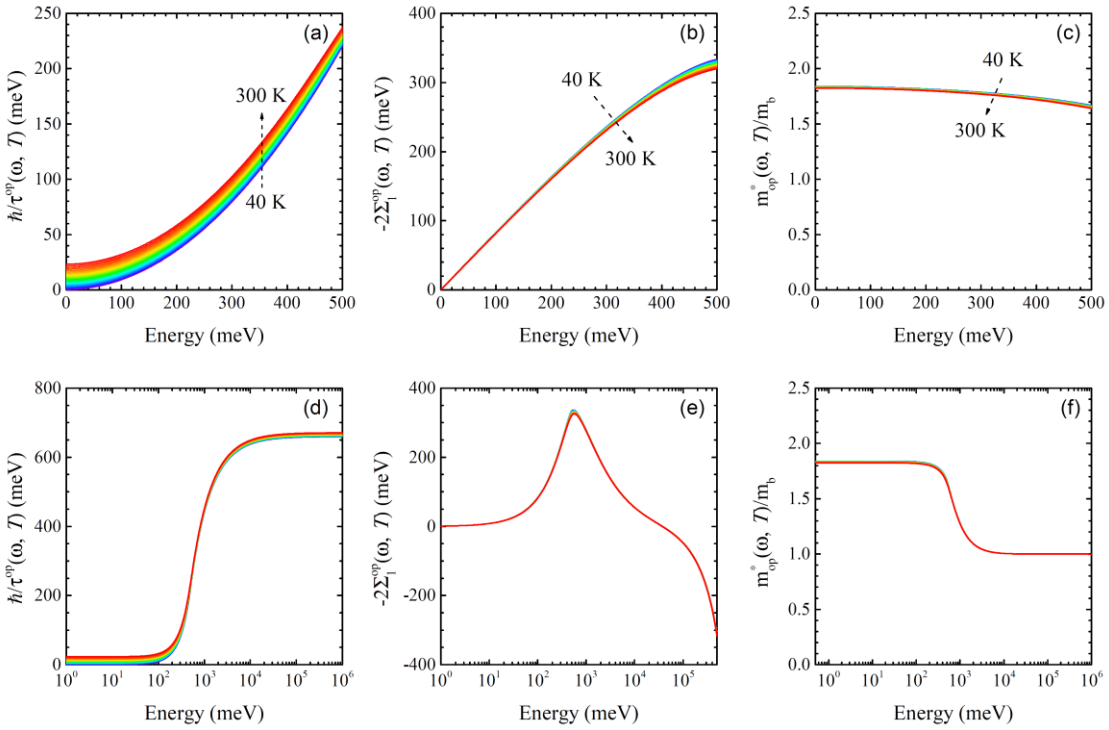

Figure S3: (a - c) The optical scattering rate, the real part of the optical self-energy, and the optical effective mass between 0 and 500 meV. (d - f) The corresponding quantities in a wide spectral range. These quantities were obtained from another model (temperature-independent) EBSD function in the case of Fermi-liquid behavior.

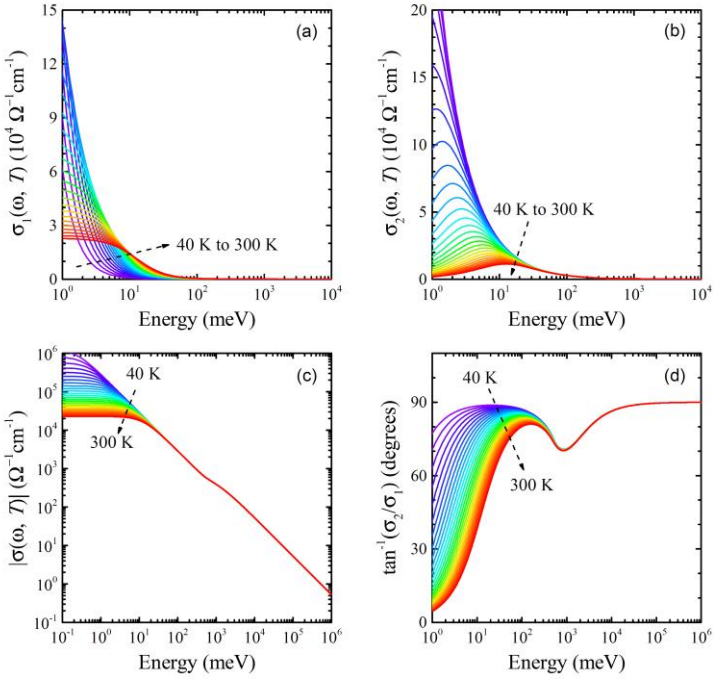

Figure S4: (a, b) The real and imaginary parts of the complex optical conductivity in a wide spectral range. (c, d) The amplitude and phase of the complex optical conductivity in a wide spectral range. These quantities are of Fermi-liquid behavior.

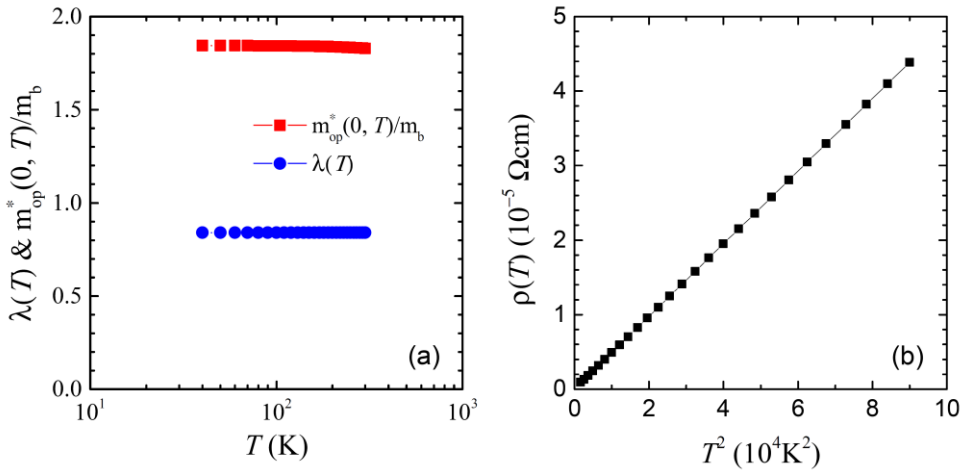

Figure S5: (a) The coupling constant and the optical effective mass at zero energy as functions of temperature. (b) The DC resistivity as a function of temperature obtained from the optical conductivity in the case of Fermi-liquid behavior.

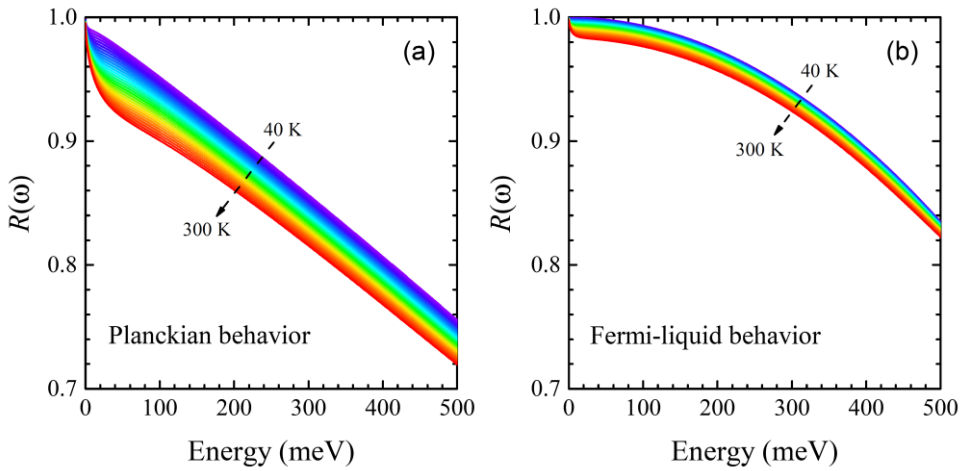

Figure S6: The reflectance spectra at various temperatures from 40 to 300 K with a 10 K increment in the cases of (a) Planckian behavior and (b) Fermi-liquid behavior.